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<222> (452)

<220>

<223> n equals a,t,g, or c

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1560
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tttgggcatg tgctattacc agaaacaaca aacttatatt taaaataccc ttcatttgac
                                                                   1680
                                                                   1740
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acatgagcac tgtacttcat aaaggaaacg cgtatgcaga ttcagtattg tgtatctttg
                                                                   1800
                                                                    1860
gacaattaga tggacattta aaatggaact tcttttatct gacaggatca gctacaatgc
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<223> n equals a,t,g, or c
<220>
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<221> SITE

<222> (1159)

120

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<223> n equals a,t,g, or c

<400> 25

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accetetgte egeacegetg ttgccetgae aacgeeggat ateacattgg ttetgeecee .
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tgacatcatc caacaggaag cgtcaccctg agggaggaga cagaagcctg ggccaggtga
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cagtggaaga tgttgcagtg ccatcctcac ctggtggctt gaaatcggcc aaggtgggag
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                                                                       1080
cgccctctcc cacccgtgct tcccccgctc cacccctcac ctcacctcgc cccsgcccca
                                                                       1140
cccatcgcgc cccggcccgt cccatcgagg cccatgcaac ccacgctcgg tyccgttccg
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<211> 1340
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agaaaaagtc ctacctggag cgacgttaaa ggaagctgag gacaacatcc gggagatgct
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gatggcacga agggcccagt agggagcctc tctgggaagc tcttcctcct gcccctccca
                                                                         420
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 ttcctggtgg gggcagagga gtgtctgcag ggaaacagct tctcctctgc cccgatggat
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gctttatttg gatggcctgg caacatcaca ttttctgcat caccctgagc cccatttgct
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tccaaaagga agttcaacag taagcagcac ctccaagact gtctccttty ggccartatc
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agctggctca tcccagccag gtgggccaat tattcaattt tcaagaattt tgttgcaagc
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cagttgtcaa acacagccat tataattatg taaatttgca aattatgtta aaaacaagga
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ctgtcactct ctggccattg aaaggcttct gttccttaaa gtgctgttac actctccttt
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<211> 696
<212> DNA
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<220>
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                                                                        240
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atggtcccca gtctcccctc cacttggtgg ggtcaccaac tactcaccag aagggggctt
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accaagaaag ccctaaaaag ctgttgactt atctgcgctt gttccaactc ttatgccccc
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tgcagtatac gttgaatgta tatgaacata ctttcctatt tctgttcttt gaaaatgtca
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                                                                        660
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<210> 29
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gtgcatttcc agtccagcaa atggaaatct ggggagtcta tactttgctc acaactcatc
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                                                                        300
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                                                                         660
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                                                                         360
accetecaet atgacegeta taccacetee egeaggetgg ateccatece acagttgaaa
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                                                                         480
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                                                                     1080
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                                                                     1320
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                                                                     1800
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                                                                     1920
aatttttcaa caaaagtctt ttaataacaa aagcatgcag ttctctgtga aatctcaaat
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attgctgtct acaggtttct ttcagattat gttcatgggt ttgtgtgtat acaatatgaa
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<223> n equals a,t,g, or c
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<223> n equals a,t,g, or c
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<222> (957)
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gggctttatg ggaccntaaa gttattatag cttggaaggt aaaaaaaaa aaagggnggg
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<212> DNA
<213> Homo sapiens
<400> 45
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                                                                       360
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                                                                       420
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                                                                       480
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                                                                    1740
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                                                                    1860
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 2017
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<210> 46
<211> 981
<212> DNA
<213> Homo sapiens
<400> 46
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ttttcacgcc cctgcagacg ggaagctgcr ttcccgaaca ctaggcagcc cccgggtctg
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cacctccaga gcccacccta ccaccagaca cagagecegg accaectgga cctaccetee
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<210> 47
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<211> 146

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (146)

<223> Xaa equals stop translation

<400> 47 Met His Tyr Gln Met Ser Val Thr Leu Lys Tyr Glu Ile Lys Lys Leu Ile Tyr Val His Leu Val Ile Trp Leu Leu Leu Val Ala Lys Met Ser Val Gly His Leu Arg Leu Leu Ser His Asp Gln Val Ala Met Pro Tyr Gln Trp Glu Tyr Pro Tyr Leu Leu Ser Ile Leu Pro Ser Leu Leu Gly Leu Leu Ser Phe Pro Arg Asn Asn Ile Ser Tyr Leu Val Leu Ser Met Ile Ser Met Gly Leu Phe Ser Ile Ala Pro Leu Ile Tyr Gly Ser Met Glu Met Phe Pro Ala Ala Gln Pro Ser Thr Ala Met Ala Arg Pro Thr Val Ser Ser Leu Val Phe Leu Pro Phe Pro Ser Cys Thr Trp Cys Trp Cys Trp Gln Cys Lys Cys Met Pro Gly Ser Cys Thr Thr Ala Arg Ser Ser Xaa <210> 48 <211> 312 <212> PRT <213> Homo sapiens <220> <222> (312) <223> Xaa equals stop translation <400> 48 Met Asn Ser Val Val Ser Leu Leu Leu Ile Leu Glu Pro Asp Lys Gln Glu Ala Leu Ile Glu Ser Leu Cys Glu Lys Leu Val Lys Phe Arg Glu Gly Glu Arg Pro Ser Leu Arg Leu Gln Leu Leu Ser Asn Leu Phe His

Gly Met Asp Lys Asn Thr Pro Val Arg Tyr Thr Val Tyr Cys Ser Leu

Ile Lys Val Ala Ala Ser Cys Gly Ala Ile Gln Tyr Ile Pro Thr Glu

Leu Asp Gln Val Arg Lys Trp Ile Ser Asp Trp Asn Leu Thr Thr Glu 95

Lys Lys His Thr Leu Leu Arg Leu Leu Tyr Glu Ala Leu Val Asp Cys 100

Lys Lys Ser Asp Ala Ala Ser Lys Val Met Val Glu Leu Leu Gly Ser 115

Tyr Thr Glu Asp Asn Ala Ser Gln Ala Arg Val Asp Ala His Arg Cys 130

Ile Val Arg Ala Leu Lys Asp Pro Asn Ala Phe Leu Phe Asp His Leu 145

Leu Thr Leu Lys Pro Val Lys Phe Leu Glu Gly Glu Leu Ile His Asp 165

Leu Leu Thr Ile Phe Val Ser Ala Lys Leu Ala Ser Tyr Val Lys Phe 180

Tyr Gln Asn Asn Lys Asp Phe Ile Asp Ser Leu Gly Leu Leu His Glu
195

Gln Asn Met Ala Lys Met Arg Leu Leu Thr Phe Met Gly Met Ala Val 210 215

Glu Asn Lys Glu Ile Ser Phe Asp Thr Met Gln Gln Glu Leu Gln Ile 230 235 240

Gly Ala Asp Asp Val Glu Ala Phe Val Ile Asp Ala Val Arg Thr Lys 255

Met Val Tyr Cys Lys Ile Asp Gln Thr Gln Arg Lys Val Val Val Ser 260

His Ser Thr His Arg Thr Phe Gly Lys Gln Gln Trp Gln Gln Leu Tyr 275

Asp Thr Leu Asn Ala Trp Lys Gln Asn Leu Asn Lys Val Lys Asn Ser 290

Leu Leu Ser Leu Ser Asp Thr Xaa 305

<210> 49

<211> 64

<212> PRT

<213> Homo sapiens

Met Met Ser Phe Phe Cys Phe Val Met Gly Val Thr Val Ala Ala Thr

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1

Phe Thr Ala Ile Val Pro Arg Trp Arg Leu Ser Gln Lys Glu Ile Gly
20 25 30

Ser Val Leu Ser Val Trp Leu Ser Arg Trp Arg Glu Asn Ser Leu Arg
35 40 45

Ser Leu Val Ser Gln Ser Val Ala Arg Ser Gly Lys Val Val Ile Arg 50 55 60

<210> 50

<211> 467

<212> PRT

<213> Homo sapiens

<400> 50

Met Leu Ser Arg Pro Gln Pro Pro Pro Asp Pro Leu Leu Gln Arg
1 5 10 15

Leu Pro Arg Pro Ser Ser Leu Ser Asp Lys Thr Gln Leu His Ser Arg
20 25 30

Trp Leu Asp Ser Ser Arg Cys Leu Met Gln Gln Gly Ile Lys Ala Gly 35 40 45

Asp Ala Leu Trp Leu Arg Phe Lys Tyr Tyr Ser Phe Phe Asp Leu Asp 50 55 60

Pro Lys Thr Asp Pro Val Arg Leu Thr Gln Leu Tyr Glu Gln Ala Arg 65 70 75 80

Trp Asp Leu Leu Glu Glu Ile Asp Cys Thr Glu Glu Met Met 85 90 95

Val Phe Ala Ala Leu Gln Tyr His Ile Asn Lys Leu Ser Gln Ser Gly
100 105 110

Glu Val Gly Glu Pro Ala Gly Thr Asp Pro Gly Leu Asp Asp Leu Asp 115 120 125

Val Ala Leu Ser Asn Leu Glu Val Lys Leu Glu Gly Ser Ala Pro Thr 130 135 140

Asp Val Leu Asp Ser Leu Thr Thr Ile Pro Glu Leu Lys Asp His Leu 145 150 155 160

Arg Ile Phe Arg Pro Arg Lys Leu Thr Leu Lys Gly Tyr Arg Gln His
165 170 175

Trp Val Val Phe Lys Glu Thr Thr Leu Ser Tyr Tyr Lys Ser Gln Asp 180 185 190

Glu Ala Pro Gly Asp Pro Ile Gln Gln Leu Asn Leu Lys Gly Cys Glu 195 200 205

Val Val Pro Asp Val Asn Val Ser Gly Gln Lys Phe Cys Ile Lys Leu 210 215 220 Leu Val Pro Ser Pro Glu Gly Met Ser Glu Ile Tyr Leu Arg Cys Gln 235 240

Asp Glu Gln Gln Tyr Ala Arg Trp Met Ala Gly Cys Arg Leu Ala Ser 255 255

Lys Gly Arg Thr Met Ala Asp Ser Ser Tyr Thr Ser Glu Val Gln Ala 260

Ile Leu Ala Phe Leu Ser Leu Gln Arg Thr Gly Ser Gly Gly Pro Gly 275

Asn His Pro His Gly Pro Asp Ala Ser Ala Glu Gly Leu Asn Pro Tyr 290 295

Gly Leu Val Ala Pro Arg Phe Gln Arg Lys Phe Lys Ala Lys Gln Leu 315 320

Thr Pro Arg Ile Leu Glu Ala His Gln Asn Val Ala Gln Leu Ser Leu 335

Ala Glu Ala Gln Leu Arg Phe Ile Gln Ala Trp Gln Ser Leu Pro Asp 340 345

Phe Gly Ile Ser Tyr Val Met Val Arg Phe Lys Gly Ser Arg Lys Asp 355

Glu Ile Leu Gly Ile Ala Asn Asn Arg Leu Ile Arg Ile Asp Leu Ala 370 375

Val Gly Asp Val Val Lys Thr Trp Arg Phe Ser Asn Met Arg Gln Trp 395 400

Asn Val Asn Trp Asp Ile Arg Gln Val Ala Ile Glu Phe Asp Glu His 405

Ile Asn Val Ala Phe Ser Cys Val Ser Ala Ser Cys Arg Ile Val His
420 425 430

Glu Tyr Ile Gly Gly Tyr Ile Phe Leu Ser Thr Arg Glu Arg Ala Arg 435 440 445

Gly Glu Glu Leu Asp Glu Ásp Leu Phe Leu Gln Leu Thr Gly Gly His 450

Glu Ala Phe 465

<210> 51

<211> 83

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (83)

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<223> Xaa equals stop translation
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<400> 51

Met Arg Pro Gly Arg Gly Ala Gly Thr Pro Gly Arg Pro Gly Arg Gly
1 10 15

Arg Gly Leu Ala Ala Thr Cys Ser Leu Ser Ser Pro Ser His Leu Leu 20 25 30

Pro Thr Leu Leu His Thr Phe Ser Phe Ser Leu Pro Pro Pro Ser Pro 35 40 45

Ala Ala Pro Arg Gln Pro Ser Pro Pro Ala Leu Leu Pro Gly Pro 50 55 60

Gln Lys Pro Arg Pro Gly Asp Pro Thr Tyr Thr Gly Ala Leu Thr Asp 65 70 75 80

Trp Ser Xaa

<210> 52

<211> 63

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (63)

<223> Xaa equals stop translation

<400> 52

Met Phe Leu Val Phe Phe Leu Ser Phe Phe Ser His Ser Ile Ser Ala 1 5 10 15

Leu Thr Leu Val Cys Ser Gln Gly Gly Lys Ala Asp Met Asn Leu Leu 20 25 30

Ser Trp Asp Phe Arg Pro His Trp Leu Glu Gly Ile Arg Phe Leu Leu
35 40 45

Gly Trp Gly Gln Ala Leu Met Ala Gly Leu Phe Pro Trp Leu Xaa 50 55 60

<210> 53

<211> 124

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (114)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

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<222> (124)
  <223> Xaa equals stop translation
  <400> 53
  Met Arg Gly Ser Trp His Arg Ser Pro Leu Pro Ala Val Leu Pro
                    5
    1
                                        10
                                                            15
  Ser Val Leu Gln Thr Ala Leu Ser Pro Leu Ala Leu Cys Gln Ala Trp
               20
                                    25
 Arg Arg Ala Val Pro His Gly Val Pro Ser Gln Arg Leu Arg Asn Gln
           35
                               40
                                                    45
 Glu Ala Ser Leu Val Pro Lys Gly Val Pro Arg Ala Trp Tyr Pro Gly
       50
                           55
                                                60
  Pro Leu Gln Asn Gly Leu Trp Thr His Leu Glu Lys Gly Glu Leu Leu
   65
                       70
                                           75
 Gly Leu Lys Pro Thr Pro Gly Gly Leu Leu Leu Arg Ser Phe Trp
                   85
                                       90
                                                            95
 Asp Pro His Pro Ser Arg Pro Phe Leu Cys Thr Leu Leu Pro Pro
                                                      110
              100
                                 105
 Leu Xaa Ile Phe Pro Pro Leu Arg Cys Ser Ala Xaa
         115
                              120
 <210> 54
 <211> 180
 <212> PRT
 <213> Homo sapiens
 <220>
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 <222> (8)
 <223> Xaa equals any of the naturally occurring L-amino acids
 <220>
 <221> SITE
 <222> (27)
 <223> Xaa equals any of the naturally occurring L-amino acids
 <220>
 <221> SITE
 <222> (84)
- <223> Xaa equals any of the naturally occurring L-amino acids
 <220>
 <221> SITE
 <222> (85)
 <223> Xaa equals any of the naturally occurring L-amino acids
 <220>
 <221> SITE
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<223> Xaa equals any of the naturally occurring L-amino acids

<222> (86)

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<220>
<221> SITE
<222> (99)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (180)
<223> Xaa equals stop translation
<400> 54
Met Thr Ser Ala Gly Pro Val Xaa Leu Phe Leu Leu Val Ser Ile Ser
                   5
                                      10 .
Thr Ser Val Ile Leu Met Gln His Leu Leu Xaa Ala Ser Tyr Cys Asp
                                  25
                                                      30
             20
Leu Leu His Lys Ala Ala Ala His Leu Gly Cys Trp Gln Lys Val Asp
         35
                                                  45
Pro Ala Leu Cys Ser Asn Val Leu Gln His Pro Trp Thr Glu Glu Cys
                                              60
     50
                          55
Met Trp Pro Gln Gly Val Leu Val Lys His Ser Lys Asn Val Tyr Lys
                      70
                                                               80
 65
                                          75
Ala Val Gly Xaa Xaa Xaa Val Ala Ile Pro Ser Asp Val Ser His Phe
                 85
Arg Phe Xaa Phe Phe Phe Ser Lys Pro Leu Arg Ile Leu Asn Ile Leu
                                                     110
            100
                                 105
Leu Leu Glu Gly Ala Val Ile Val Tyr Gln Leu Tyr Ser Leu Met
        115
                             120
                                                 125
Ser Ser Glu Lys Trp His Gln Thr Ile Ser Leu Ala Leu Ile Leu Phe
    130
                         135
                                             140
Ser Asn Tyr Tyr Ala Phe Phe Lys Leu Leu Arg Asp Arg Leu Val Leu
                                                             160
                                         155
                    150
145
Gly Lys Ala Tyr Ser Tyr Ser Ala Ser Pro Gln Arg Asp Leu Asp His
                                     170
                165
Arg Phe Ser Xaa
            180
<210> 55
<211> 287
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (221)
<223> Xaa equals any of the naturally occurring L-amino acids
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<220>

<221> SITE

<222> (287)

<223> Xaa equals stop translation

Met Pro Leu Phe Lys Leu Tyr Met Val Met Ser Ala Cys Phe Leu Ala 5 1

Ala Gly Ile Phe Trp Val Ser Ile Leu Cys Arg Asn Thr Tyr Ser Val 20

Phe Lys Ile His Trp Leu Met Ala Ala Leu Ala Phe Thr Lys Ser Ile 35

Ser Leu Leu Phe His Ser Ile Asn Tyr Tyr Phe Ile Asn Ser Gln Gly 55 50

Pro Pro His Arg Arg Pro Cys Arg His Val Leu His Arg Thr Pro Ala 70 65

Glu Gly Arg Pro Pro Leu His His His Arg Pro Asp Trp Leu Arg Leu 85

Gly Phe Ile Lys Tyr Val Leu Ser Asp Lys Glu Lys Lys Val Phe Gly 100

Ile Val Ile Pro Met Gln Val Leu Ala Asn Val Ala Tyr Ile Ile Ile 120 115

Glu Ser Arg Glu Glu Gly Ala Thr Asn Tyr Val Leu Trp Lys Glu Ile 135 130

Leu Phe Leu Val Asp Leu Ile Cys Cys Gly Ala Ile Leu Phe Pro Val 150 145

Val Trp Ser Ile Arg His Leu Gln Asp Ala Ser Gly Thr Asp Gly Lys 165

Val Ala Val Asn Leu Ala Lys Leu Lys Leu Phe Arg His Tyr Tyr Val 180

Met Val Ile Cys Tyr Val Tyr Phe Thr Arg Ile Ile Ala Ile Leu Leu 195

Gln Val Ala Val Pro Phe Gln Trp Gln Trp Leu Tyr Xaa Leu Leu Val 215 210

Glu Gly Ser Thr Leu Ala Phe Phe Val Leu Thr Gly Tyr Lys Phe Gln 230 225

Pro Thr Gly Asn Asn Pro Tyr Leu Gln Leu Pro Gln Glu Asp Glu Glu 245

Asp Val Gln Met Glu Gln Val Met Thr Asp Ser Gly Phe Arg Glu Gly 260

Leu Ser Lys Val Asn Lys Thr Ala Ser Gly Arg Glu Leu Leu Xaa

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285
                            280
        275
<210> 56
<211> 34
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (34)
<223> Xaa equals stop translation
<400> 56
Met Pro Met Val Phe Leu Leu Phe Asn Leu Met Ser Trp Leu Ile
                                                          15
                                     10
  1
Arg Asn Ala Arg Val Ile Leu Arg Ser Leu Asn Leu Lys Arg Asp Gln
                                                      30
                                 25
             20
Val Xaa
<210> 57
<211> 24
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (24)
<223> Xaa equals stop translation
<400> 57
Met Lys Ile Val Val Leu Leu Pro Leu Phe Leu Leu Ala Thr Phe Pro
                                                          15
                                     10
Arg Lys Leu Gln Thr Cys Leu Xaa
             20
<210> 58
<211> 47
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (47)
<223> Xaa equals stop translation
<400> 58
Met Ser Gly Glu Gly Ala Ala Leu Pro Ile Leu Leu Leu Leu Leu
                                     10
  1
Ala Leu Arg Gly Thr Phe His Gly Ala Arg Pro Gly Gly Gly Ala Ser
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20 25 30

Gly Ile Trp Cys Leu Leu Pro Glu Gln Glu Pro Pro Val Xaa 35 40 45

<210> 59

<211> 114

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (114)

<223> Xaa equals stop translation

<400> 59

Met Ala Arg Gly Ser Leu Arg Arg Leu Leu Arg Leu Leu Val Leu Gly
1 10 15

Leu Trp Leu Ala Leu Leu Arg Ser Val Ala Gly Glu Gln Ala Pro Gly
20 25 30

Thr Ala Pro Cys Ser Arg Gly Ser Ser Trp Ser Ala Asp Leu Asp Lys
35 40 45

Cys Met Asp Cys Ala Ser Cys Arg Ala Arg Pro His Ser Asp Phe Cys 50 60

Leu Gly Cys Ala Ala Pro Pro Ala Pro Phe Arg Leu Leu Trp Pro 65 70 75 80

Ile Leu Gly Gly Ala Leu Ser Leu Thr Phe Val Leu Gly Leu Leu Ser 85 90 95

Gly Phe Leu Val Trp Arg Arg Cys Arg Arg Glu Arg Ser Ser Pro Pro 100 105 110

Pro Xaa

<210> 60

<211> 32

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (26)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (32)

<223> Xaa equals stop translation

<400> 60

Met Val Cys Ile Leu Val Leu Thr Leu Val Ser Tyr Ser Ser Leu Val 1 5 15

Asn Ser Pro Leu Pro Phe Val His Leu Xaa Val Gly Ile Ser Ala Xaa 20 25 30

<210> 61

<211> 81

<212> PRT

<213> Homo sapiens

<220> ·

<221> SITE

<222> (19)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (33)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (81)

<223> Xaa equals stop translation

<400> 61

Met Thr Gly Gly Phe Leu Ser Cys Ile Leu Gly Leu Val Leu Pro Leu 1 5 10 15

Ala Tyr Xaa Ser Ser Leu Thr Trp Cys Trp Trp Arg Trp Gly Leu Pro
20 25 30

Xaa Pro Ala Gly Pro Pro Arg Cys Thr Pro Gly Cys Asn Ala Ser Gly
35 40 45

Ala Gly Arg Gly Pro Ser Pro Gly Pro Pro Gly Gly Glu Leu His Thr 50 55 60

Pro Ala Ser Arg Asp Pro Gly Pro Gly Ala Glu Trp Arg Gly Thr Ser 65 70 75 80

Xaa

<210> 62

<211> 104

<212> PRT

<213> Homo sapiens

<400> 62

Met Ala Ala Pro Val Asp Leu Glu Leu Lys Lys Ala Phe Thr Glu Leu 1 5 10 15

Gln Ala Lys Val Ile Asp Thr Gln Gln Lys Val Lys Leu Ala Asp Ile 20 25 30

Gln Ile Glu Gln Leu Asn Arg Thr Lys Lys His Ala His Leu Thr Asp 35 40 45

Thr Glu Ile Met Thr Leu Val Asp Glu Thr Asn Met Tyr Glu Gly Val 50 60

Gly Arg Met Phe Ile Leu Gln Ser Lys Glu Ala Ile His Ser Gln Leu 65 70 75 80

Leu Glu Lys Gln Lys Ile Ala Glu Glu Lys Ile Lys Glu Leu Glu Gln
85 90 95

Lys Lys Ser Tyr Leu Glu Arg Arg 100

<210> 63

<211> 146

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (146)

<223> Xaa equals stop translation

<400> 63

Met Pro Ser Gly Phe Gln Thr Cys Leu Leu Phe Thr Leu Ser Pro Phe
1 5 10 15

Ser Leu Ser Lys Ile Val Gly Val Pro Ser Gln Gln Leu Pro Gly Gln 20 25 30

Leu Ser Glu Gln Gly Gly Leu Cys Gly His Glu Gly Glu Pro Ala Arg
35 40 45

Thr Val Pro Glu Thr Gln Leu Pro Leu Pro Phe Asn Ser Ala Gly Pro 50 60

Pro His Leu Lys Cys Thr Gly Ala Gly Lys Arg Val Trp Ser Pro Pro 65 70 75 80

Arg Arg Ala Ala Gln Glu Val Ser Leu Gln Leu Val Ser Cys His Pro 85 90 95

Cys Arg Gln His Thr Ser Arg Ala Phe Ser Leu Ala Thr Asp Arg Thr 100 105 110

Ala Ser Ala Arg Val Cys Cys Arg Ser Pro Leu Ser Thr Leu Ile His 115 120 125

His Thr Arg Gly Gly Gln Arg Cys Arg Glu His Gly Leu Ser Leu Pro 130 135 140

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Leu Xaa
145
<210> 64
<211> 31
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (31)
<223> Xaa equals stop translation
Met Ala Ile Leu Met Leu Leu Ala Gly Ser Pro Cys Thr Leu Ser Phe
   1
Ser Thr Asp Thr Gly Ser Ser Ala Pro Gly Pro Lys Ile Pro Xaa
                        · .. · 25
              20
 <210> 65
 <211> 260
 <212> PRT
 <213> Homo sapiens
 <220>
 <221> SITE
 <222> (260)
 <223> Xaa equals stop translation
 Met Asp Pro Gln Gly Gln Thr Leu Leu Phe Leu Phe Val Asp Phe
    1
  His Ser Ala Phe Pro Val Gln Gln Met Glu Ile Trp Gly Val Tyr Thr
                                    25
               20
  Leu Leu Thr Thr His Leu Asn Ala Ile Leu Val Glu Ser His Ser Val
           35
  Val Gln Gly Ser Ile Gln Phe Thr Val Asp Lys Val Leu Glu Gln His
                            55
        50
  His Gln Ala Ala Lys Ala Gln Gln Lys Leu Gln Ala Ser Leu Ser Val
                        70
    65
   Ala Val Asn Ser Ile Met Ser Ile Leu Thr Gly Ser Thr Arg Ser Ser
                    85
   Phe Arg Lys Met Cys Leu Gln Thr Leu Gln Ala Ala Asp Thr Gln Glu
                100
   Phe Arg Thr Lys Leu His Lys Val Phe Arg Glu Ile Thr Gln His Gln
                                120
           115
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Phe Leu His His Cys Ser Cys Glu Val Lys Gln Leu Thr Leu Glu Lys

Lys Asp Ser Ala Gln Gly Thr Glu Asp Ala Pro Asp Asn Ser Ser Leu 150 145

Glu Leu Leu Ala Asp Thr Ser Gly Gln Ala Glu Asn Lys Arg Leu Lys 170 165

Arg Gly Ser Pro Arg Ile Glu Glu Met Arg Ala Leu Arg Ser Ala Arg 185 180

Ala Pro Ser Pro Ser Glu Ala Ala Pro Arg Arg Pro Glu Ala Thr Ala 200 195

Ala Pro Leu Thr Pro Arg Gly Arg Glu His Arg Glu Ala His Gly Arg 215 210

Ala Leu Ala Pro Gly Arg Ala Ser Leu Gly Ser Arg Leu Glu Asp Val 230 225

Leu Trp Leu Gln Glu Val Ser Asn Leu Ser Glu Trp Leu Ser Pro Ser 245

Pro Gly Pro Xaa 260

<210> 66

<211> 339

<212> PRT

<213> Homo sapiens

Met Ala Ala Cys Gly Pro Gly Ala Ala Gly Tyr Cys Leu Leu 5 1

Gly Leu His Leu Phe Leu Leu Thr Ala Gly Pro Ala Leu Gly Trp Asn 25 20

Asp Pro Asp Arg Met Leu Leu Arg Asp Val Lys Ala Leu Thr Leu His 35

Tyr Asp Arg Tyr Thr Thr Ser Arg Arg Leu Asp Pro Ile Pro Gln Leu 55 50

Lys Cys Val Gly Gly Thr Ala Gly Cys Asp Ser Tyr Thr Pro Lys Val 70 65

Ile Gln Cys Gln Asn Lys Gly Trp Asp Gly Tyr Asp Val Gln Trp Glu 85

Cys Lys Thr Asp Leu Asp Ile Ala Tyr Lys Phe Gly Lys Thr Val Val 105 100

Ser Cys Glu Gly Tyr Glu Ser Ser Glu Asp Gln Tyr Val Leu Arg Gly 120 115

Ser Cys Gly Leu Glu Tyr Asn Leu Asp Tyr Thr Glu Leu Gly Leu Gln

Lys Leu Lys Glu Ser Gly Lys Gln His Gly Phe Ala Ser Phe Ser Asp Tyr Tyr Tyr Lys Trp Ser Ser Ala Asp Ser Cys Asn Met Ser Gly Leu Ile Thr Ile Val Val Leu Leu Gly Ile Ala Phe Val Val Tyr Lys Leu Phe Leu Ser Asp Gly Gln Tyr Ser Pro Pro Pro Tyr Ser Glu Tyr Pro Pro Phe Ser His Arg Tyr Gln Arg Phe Thr Asn Ser Ala Gly Pro Pro Pro Pro Gly Phe Lys Ser Glu Phe Thr Gly Pro Gln Asn Thr Gly His Gly Ala Thr Ser Gly Phe Gly Ser Ala Phe Thr Gly Gln Gln Gly Tyr Glu Asn Ser Gly Pro Gly Phe Trp Thr Gly Leu Gly Thr Gly Gly Ile Leu Gly Tyr Leu Phe Gly Ser Asn Arg Ala Ala Thr Pro Phe Ser Asp Ser Trp Tyr Tyr Pro Ser Tyr Pro Pro Ser Tyr Pro Gly Thr Trp Asn Arg Ala Tyr Ser Pro Leu His Gly Gly Ser Gly Ser Tyr Ser Val Cys Ser Asn Ser Asp Thr Lys Thr Arg Thr Ala Ser Gly Tyr Gly Gly Thr Arg Arg Arg <210> 67 <211> 27 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (27) <223> Xaa equals stop translation <400> 67 Met His Ala Leu Ile Leu Gln Phe Ile Phe Ser Leu Cys Met Tyr Ile

Ser Leu Phe Ser Ala Ala Arg Phe Leu Phe Xaa

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<210> 68
 <211> 76
 <212> PRT
 <213> Homo sapiens
 <220>
 <221> SITE
 <222> (64)
 <223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (65)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 68
Met Ser Gln Ser Val Ser Ser Ser Phe Leu Ile Leu Thr Leu Leu
  1
                   5
                                      10
                                                           15
Ser Val Gly Phe Gln Cys Leu Thr Leu Tyr Thr Thr Val Thr Thr
                                  25
              20
                                                      30
Cys Leu Trp Gly Pro Pro Arg Ala Ala Gly Arg Leu Phe Val Gln Ser
         35
                                                  45
Leu Pro Ser Cys Glu Cys Cys Cys Arg Ala Arg Arg Gly Ala Val Xaa
     50
                          55
Xaa Ser Pro Pro Trp Arg Pro Trp Pro Glu Gln Val
 65
                                          75
                      70
<210> 69
<211> 216
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (216)
<223> Xaa equals stop translation
<400> 69
Met Tyr Leu Ser Ile Ile Phe Leu Ala Phe Val Ser Ile Asp Arg Cys
                                                          15
  1
                  5
                                      10
Leu Gln Leu Thr His Ser Cys Lys Ile Tyr Arg Ile Gln Glu Pro Gly
                                                      30
             20
                                  25
Phe Ala Lys Met Ile Ser Thr Val Val Trp Leu Met Val Leu Leu Ile
         35
Met Val Pro Asn Met Met Ile Pro Ile Lys Asp Ile Lys Glu Lys Ser
                                              60
     50
                         55
Asn Val Gly Cys Met Glu Phe Lys Lys Glu Phe Gly Arg Asn Trp His
```

Leu Leu Thr Asn Phe Ile Cys Val Ala Ile Phe Leu Asn Phe Ser Ala Ile Ile Leu Ile Ser Asn Cys Leu Val Ile Arg Gln Leu Tyr Arg Asn Lys Asp Asn Glu Asn Tyr Pro Asn Val Lys Lys Ala Leu Ile Asn Ile Leu Leu Val Thr Thr Gly Tyr Ile Ile Cys Phe Val Pro Tyr His Ile Val Arg Ile Pro Tyr Thr Leu Ser Gln Thr Glu Val Ile Thr Asp Cys Ser Thr Arg Ile Ser Leu Phe Lys Ala Lys Glu Ala Thr Leu Leu Leu Ala Val Ser Asn Leu Cys Phe Asp Pro Ile Leu Tyr Tyr His Leu Ser Lys Ala Phe Arg Ser Lys Val Thr Glu Thr Phe Ala Ser Pro Lys Glu Thr Lys Val Arg Lys Lys Asn Xaa <210> 70 <211> 407 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (407) <223> Xaa equals stop translation <400> 70 Met His Pro Ala Val Phe Leu Ser Leu Pro Asp Leu Arg Cys Ser Leu Leu Leu Val Thr Trp Val Phe Thr Pro Val Thr Thr Glu Ile Thr Ser Leu Asp Thr Glu Asn Ile Asp Glu Ile Leu Asn Asn Ala Asp Val Ala Leu Val Asn Phe Tyr Ala Asp Trp Cys Arg Phe Ser Gln Met Leu His Pro Ile Phe Glu Glu Ala Ser Asp Val Ile Lys Glu Glu Phe Pro Asn Glu Asn Gln Val Val Phe Ala Arg Val Asp Cys Asp Gln His Ser

- Asp Ile Ala Gln Arg Tyr Arg Ile Ser Lys Tyr Pro Thr Leu Lys Leu 100
- Phe Arg Asn Gly Met Met Met Lys Arg Glu Tyr Arg Gly Gln Arg Ser 115
- Val Lys Ala Leu Ala Asp Tyr Ile Arg Gln Gln Lys Ser Asp Pro Ile 130
- Gln Glu Ile Arg Asp Leu Ala Glu Ile Thr Thr Leu Asp Arg Ser Lys
 150
 150
- Arg Asn Ile Ile Gly Tyr Phe Glu Gln Lys Asp Ser Asp Asn Tyr Arg 165
- Val Phe Glu Arg Val Ala Asn Ile Leu His Asp Asp Cys Ala Phe Leu 180
- Ser Ala Phe Gly Asp Val Ser Lys Pro Glu Arg Tyr Ser Gly Asp Asn 195
- Ile Ile Tyr Lys Pro Pro Gly His Ser Ala Pro Asp Met Val Tyr Leu 210 220
- Gly Ala Met Thr Asn Phe Asp Val Thr Tyr Asn Trp Ile Gln Asp Lys 240 225
- Cys Val Pro Leu Val Arg Glu Ile Thr Phe Glu Asn Gly Glu Glu Leu 255
- Thr Glu Glu Gly Leu Pro Phe Leu Ile Leu Phe His Met Lys Glu Asp 260 265
- Thr Glu Ser Leu Glu Ile Phe Gln Asn Glu Val Ala Arg Gln Leu Ile 275
- Ser Glu Lys Gly Thr Ile Asn Phe Leu His Ala Asp Cys Asp Lys Phe 290
- Arg His Pro Leu Leu His Ile Gln Lys Thr Pro Ala Asp Cys Pro Val 320 305
- Ile Ala Ile Asp Ser Phe Arg His Met Tyr Val Phe Gly Asp Phe Lys 325
- Asp Val Leu Ile Pro Gly Lys Leu Lys Gln Phe Val Phe Asp Leu His 340
- Ser Gly Lys Leu His Arg Glu Phe His His Gly Pro Asp Pro Thr Asp 365
- Thr Ala Pro Gly Glu Gln Ala Gln Asp Val Ala Ser Ser Pro Pro Glu 370
- Ser Ser Phe Gln Lys Leu Ala Pro Ser Glu Tyr Arg Tyr Thr Leu Leu 395

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Arg Asp Arg Asp Glu Leu Xaa 405
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<210> 71

<211> 45

<212> PRT

<213> Homo sapiens

<400> 71

Met Ser Met Cys Ile His Ala Lys Lys His Leu Ile Cys Ile Cys Phe 1 5 10 15

Arg Lys Gly Gly Asn Glu Ala Thr Cys Leu Lys Ile Leu Leu Tyr Lys
20 25 30

Ala Phe Gln Pro Phe Pro Leu Ser Phe Ala Leu Ile Phe 35 40 . 45

<210> 72

<211> 34

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (34)

<223> Xaa equals stop translation

<400> 72

Met Pro Leu Lys Ala Val Thr Trp Pro Thr Leu Asn Ser Lys Leu Val 1 5 10 15

Ala Ala Val Val Asn Leu Lys Ala Ser Gln Met Pro Ala Ser Ser Arg 20 25 30

Val Xaa

<210> 73

<211> 160

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (55)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 73

Met Ala Pro Leu Ile Pro Ala Val Ala Arg Gly Ser Ser Phe Leu Leu 1 . 5 10 15

Leu His Ala Leu Thr Leu Trp Gly Ala Pro Phe Pro Thr Trp Val 20 25 30 Ser Cys Gln Pro Arg Ser Val Leu Arg Pro Ser Pro Val Arg Pro Gly 35 40 45

Val Pro Pro Leu Ala Ala Xaa Pro Leu Cys Ser Cys Val Ser Leu Phe 50 55 60

Phe Phe Arg Val Val Leu His Val Ser Ser Ile Cys Gly Val Ala Leu 65 70 75 80

Gly Pro Phe Arg Thr Gly Ala Pro Ala Gln Leu Leu Gly Pro Pro Pro 95

Val Ala Gln Gly Arg Leu Phe Val Pro Gln Pro Gln Ala Val Ser Gly
100 105 110

Glu Asn Arg Cys Val Val Pro Glu Leu Lys Phe Trp Glu Gly Gln Cys 115 120 125

Pro Phe Leu Trp Gly Pro Gly Leu Val Leu His Cys Phe Lys Arg Ser 130 135 140

Cys His Ser Asn Arg Gln Pro Cys Asn Arg Arg Ala Ala Cys Ser Pro 145 150 155 160

<210> 74 <211> 26

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (17)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (26)

<223> Xaa equals stop translation

<400> 74

Met Ala Gly Ile His Arg Ala Phe Leu Val Phe Cys Leu Trp Gly Leu
1 10 15

Xaa Leu Cys Val Val Gly Gly Pro Trp Xaa 20 25

<210> 75

<211> 91

<212> PRT

<213> Homo sapiens

<400> 75

Met Ala Ala Glu Glu Glu Asp Gly Gly Pro Glu Ala Lys Ile Ala

15 10 5 1 Ser Gly Ala Gly Arg Ala Arg Pro Ser Asn Val Ile Tyr Val Trp Arg 30 25 20 Leu Leu Gly Lys Leu Trp Ser Val Cys Val Ala Thr Cys Thr Val Gly 45 40 35 His Val Phe Ile Ser Gly Trp Arg His Gly Gln Asn Gly Lys Ser Val 60 55 50 Gln Tyr Val Lys Leu Gly Ser Ala Glu Arg Arg Leu Ser Arg Phe Met 75 70 65 Gly Glu Gly Ala Arg Ser Pro Arg Ile Pro Asp 85 <210> 76 <211> 33 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (33) <223> Xaa equals stop translation <400> 76 Met Thr Ile Trp Gln Leu Phe Ala Val Leu Ile Val Leu Phe Ala Lys 15 10 1 5 Ser Arg Glu Ile Ser Thr Glu Gly Glu Pro Cys Val Leu Ser Lys Asn 30 25 20 . . Xaa <211> 23 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (6) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (23) <223> Xaa equals stop translation <400> 77 Met Leu Asn Pro Phe Xaa Gln Leu Leu Leu Val Leu Leu Phe Pro Glu 15

Trp Pro Thr Pro Leu His Xaa 20

<210> 78 <211> 173 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (18) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (21) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (80) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (102) <223> Xaa equals any of the naturally occurring L-amino acids <400> 78 Met Lys Thr Leu Phe Leu Gly Val Thr Leu Gly Leu Ala Ala Leu 15 10 5 1 Ser Xaa Thr Leu Xaa Glu Glu Asp Ile Thr Gly Thr Trp Tyr Val Lys 30 25 20 Ala Met Val Val Asp Lys Thr Phe Arg Arg Gln Glu Ala Gln Lys Val 45 40 35 Ser Pro Val Lys Val Thr Ala Leu Gly Gly Gly Lys Leu Glu Ala Thr 55 50 Phe Thr Phe Met Arg Glu Asp Arg Cys Ile Gln Lys Lys Ile Leu Xaa 80 75 70 65 Arg Lys Thr Glu Glu Pro Gly Lys Tyr Ser Ala Cys Glu Pro Leu Pro 95 90 85 His Ser His Pro His Xaa Pro Pro Pro Pro Thr Pro Val His Gln Pro 110 105 100 Pro Gln Val Glu Ser Ala Gln Ala Ala Leu Leu Pro Gly Pro Gln Leu 125 120 115 Cys Pro Pro Pro Arg Arg Gly Trp Pro Leu Leu Pro Gly Gly Leu Val 140 . 135 130 Ala Leu Thr Ser Asp Thr Gly Cys Asp Arg Leu Val Arg Ser Arg Asp

160 155 145 150 Gly Pro Asp His Ala Cys Pro Leu Gly Gly Pro Ser His 170 165 <210> 79 <211> 208 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (148) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (186) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (208) <223> Xaa equals stop translation <400> 79 Met Ala Asp Ser Ser Tyr Thr Ser Glu Val Gln Ala Ile Leu Ala Phe 15 10 5 1 Leu Ser Leu Gln Arg Thr Gly Ser Gly Gly Pro Gly Asn His Pro His 30 25 20 Gly Pro Asp Ala Ser Ala Glu Gly Leu Asn Pro Tyr Gly Leu Val Ala 45 40 35 Pro Arg Phe Gln Arg Lys Phe Lys Ala Lys Gln Leu Thr Pro Arg Ile 60 55 50 Leu Glu Ala His Gln Asn Val Ala Gln Leu Ser Leu Ala Glu Ala Gln 80 75 65 Leu Arg Phe Ile Gln Ala Trp Gln Ser Leu Pro Asp Phe Gly Ile Ser 90 85 Tyr Val Met Val Arg Phe Lys Gly Ser Arg Lys Asp Glu Ile Leu Gly 110 105 100 Ile Ala Asn Asn Arg Leu Ile Arg Ile Asp Leu Ala Val Gly Asp Val 125 120 115 Val Lys Thr Trp Arg Phe Ser Asn Met Arg Gln Trp Asn Val Asn Trp 140 135 130 Asp Ile Arg Xaa Val Ala Ile Glu Phe Asp Glu His Ile Asn Val Ala 160 155 150 145

Phe Ser Cys Val Ser Ala Ser Cys Arg Ile Val His Glu Tyr Ile Gly

165 170 175

Gly Tyr Ile Phe Leu Ser Thr Arg Glu Xaa Ala Arg Gly Glu Glu Leu 180 185 190

Asp Glu Asp Leu Phe Leu Gln Leu Thr Gly Gly His Glu Ala Phe Xaa 195 200 205

<210> 80

<211> 146

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (95)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (100)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (146)

<223> Xaa equals stop translation

<400> 80

Met Pro Ser Gly Phe Gln Thr Cys Leu Leu Phe Thr Leu Ser Pro Phe 1 15

Ser Leu Ser Lys Ile Val Gly Val Pro Ser Gln Gln Leu Pro Gly Gln 20 25 30

Leu Ser Glu Gln Gly Gly Leu Cys Gly His Glu Gly Glu Pro Ala Arg
35 40 45

Thr Val Pro Glu Thr Gln Leu Pro Leu Pro Phe Asn Ser Ala Gly Pro 50 55 60

Pro His Leu Lys Cys Thr Gly Ala Gly Lys Arg Val Trp Ser Pro Pro 65 70 75 80

Arg Arg Ala Ala Gln Glu Val Ser Leu Gln Leu Val Ser Cys Xaa Pro 85 90 95

Cys Arg Gln Xaa Thr Ser Arg Ala Phe Ser Leu Ala Thr Asp Arg Thr
100 105 110

Ala Ser Ala Arg Val Cys Cys Arg Phe Pro Phe Lys His Thr His Ser 115 120 125

Pro His Pro Arg Arg Pro Glu Val Gln Gly Ala Trp Ala Val Val Pro

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130
                         135
                                              140
 Leu Xaa
 145
 <210> 81
 <211> 23
 <212> PRT
 <213> Homo sapiens
<220>
<221> SITE
<222> (23)
 <223> Xaa equals stop translation
<400> 81
Met Ala Ala Cys Gly Pro Gly Ala Ala Gly Thr Ala Cys Ser Ser
  1
                                                          15
                                      10
Ala Cys Ile Cys Phe Cys Xaa
              20
<210> 82
<211> 31
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (21)
<223> Xaa equals any of the naturally occurring L-amino acids
<22.0>
<221> SITE
<222> (31)
<223> Xaa equals stop translation
<400> 82
Met Lys Thr Leu Phe Leu Gly Val Thr Leu Gly Leu Ala Leu Pro Cys
                                     . 10
  1
Pro Ser Pro Trp Xaa Arg Arg Ile Ser Gln Gly Pro Gly Thr Xaa
             20
                                  25
<210> 83
<211> 374
<212> PRT
<213> Homo sapiens
<400> 83
Met Ser Val Pro Ala Phe Ile Asp Ile Ser Glu Glu Asp Gln Ala Ala
                                      10
  1
                  5
Glu Leu Arg Ala Tyr Leu Lys Ser Lys Gly Ala Glu Ile Ser Glu Glu
                                 25
                                                      30
             20
```

- Asn Ser Glu Gly Gly Leu His Val Asp Leu Ala Gln Ile Ile Glu Ala 35
- Cys Asp Val Cys Leu Lys Glu Asp Asp Lys Asp Val Glu Ser Val Met 50
- Asn Ser Val Val Ser Leu Leu Leu Ile Leu Glu Pro Asp Lys Gln Glu
 75
 80
- Ala Leu Ile Glu Ser Leu Cys Glu Lys Leu Val Lys Phe Arg Glu Gly
 85
- Glu Arg Pro Ser Leu Arg Leu Gln Leu Leu Ser Asn Leu Phe His Gly
 100 105
- Met Asp Lys Asn Thr Pro Val Arg Tyr Thr Val Tyr Cys Ser Leu Ile 115
- Lys Val Ala Ala Ser Cys Gly Ala Ile Gln Tyr Ile Pro Thr Glu Leu 130
- Asp Gln Val Arg Lys Trp Ile Ser Asp Trp Asn Leu Thr Thr Glu Lys
 150
 150
- Lys His Thr Leu Leu Arg Leu Leu Tyr Glu Ala Leu Val Asp Cys Lys
 165
- Lys Ser Asp Ala Ala Ser Lys Val Met Val Glu Leu Leu Gly Ser Tyr 180
- Thr Glu Asp Asn Ala Ser Gln Ala Arg Val Asp Ala His Arg Cys Ile 195
- Val Arg Ala Leu Lys Asp Pro Asn Ala Phe Leu Phe Asp His Leu Leu 210
- Thr Leu Lys Pro Val Lys Phe Leu Glu Gly Glu Leu Ile His Asp Leu 240
- Leu Thr Ile Phe Val Ser Ala Lys Leu Ala Ser Tyr Val Lys Phe Tyr 255
- Gln Asn Asn Lys Asp Phe Ile Asp Ser Leu Gly Leu Leu His Glu Gln 260
- Asn Met Ala Lys Met Arg Leu Leu Thr Phe Met Gly Met Ala Val Glu 275
- Asn Lys Glu Ile Ser Phe Asp Thr Met Gln Gln Glu Leu Gln Ile Gly 290
- Ala Asp Asp Val Glu Ala Phe Val Ile Asp Ala Val Arg Thr Lys Met 320 315
- Val Tyr Cys Lys Ile Asp Gln Thr Gln Arg Lys Val Val Val Ser His 335

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Ser Thr His Arg Thr Phe Gly Lys Gln Gln Trp Gln Gln Leu Tyr Asp
            340
Thr Leu Asn Ala Trp Lys Gln Asn Leu Asn Lys Val Lys Asn Ser Leu
        355
Leu Ser Leu Ser Asp Thr
     370
<210> 84
 <211> 13
 <212> PRT
 <213> Homo sapiens
 Met Ser Val Pro Ala Phe Ile Asp Ile Ser Glu Glu Asp
   1
  <210> 85
  <211> 15
  <212> PRT
  <213> Homo sapiens
  Gln Ala Ala Glu Leu Arg Ala Tyr Leu Lys Ser Lys Gly Ala Glu
    1
   <210> 86
   <211> 17
   <212> PRT
   <213> Homo sapiens
   Ile Ser Glu Glu Asn Ser Glu Gly Gly Leu His Val Asp Leu Ala Gln
                      5
    Ile
    <210> 87
    <211> 18
   . <212> PRT
    <213> Homo sapiens
    Ile Glu Ala Cys Asp Val Cys Leu Lys Glu Asp Asp Lys Asp Val Glu
       1
     Ser Val
     <210> 88
     <211> 16
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<212> PRT
 <213> Homo sapiens
 <400> 88
 Val Ala Arg Pro Ser Ser Leu Phe Arg Ser Ala Trp Ser Cys Glu Trp
                                      10
                   5
   1
 <210> 89
 <211> 12
 <212> PRT
 <213> Homo sapiens
 <400> 89
 Leu Arg Leu Gln Leu Leu Ser Asn Leu Phe His Gly
                                      10
 <210> 90
 <211> 17
 <212> PRT
 <213> Homo sapiens
 <400> 90
 Lys Asp Val Glu Ser Val Met Asn Ser Val Val Ser Leu Leu Ile
                                                          15
                                      10
                   5
 Leu
 <210> 91
 <211> 26
 <212> PRT
 <213> Homo sapiens
 <400> 91
Asp Ala Ala Ser Lys Val Met Val Glu Leu Leu Gly Ser Tyr Thr Glu
                                      10
Asp Asn Ala Ser Gln Ala Arg Val Asp Ala
              20
 <210> 92
<211> 10
 <212> PRT
 <213> Homo sapiens
 <400> 92
 Val Glu Ala Phe Val Ile Asp Ala Val Arg
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<210> 93

<211> 18

<212> PRT <213> Homo sapiens

Lys Met Arg Leu Leu Thr Phe Met Gly Met Ala Val Glu Asn Lys Glu 5 1

Ile Ser

<210> 94

<211> 196

<212> PRT

<213> Homo sapiens

Met Glu Ala Val Pro Glu Gly Asp Trp Phe Cys Thr Val Cys Leu Ala 5

Gln Gln Val Glu Gly Glu Phe Thr Gln Lys Pro Gly Phe Pro Lys Arg 20

Gly Gln Lys Arg Lys Ser Gly Tyr Ser Leu Asn Phe Ser Glu Gly Asp

Gly Arg Arg Arg Val Leu Leu Arg Gly Arg Glu Ser Pro Ala Ala

Gly Pro Arg Tyr Ser Glu Glu Gly Leu Ser Pro Ser Lys Arg Arg ·70

Leu Ser Met Arg Asn His His Ser Asp Leu Thr Phe Cys Glu Ile Ile . 85

Leu Met Glu Met Glu Ser His Asp Ala Ala Trp Pro Phe Leu Glu Pro 100

Val Asn Pro Arg Leu Val Ser Gly Tyr Arg Arg Ile Ile Lys Asn Pro

Met Asp Phe Ser Thr Met Arg Glu Arg Leu Leu Arg Gly Gly Tyr Thr

Ser Ser Glu Glu Phe Ala Ala Asp Ala Leu Leu Val Phe Asp Asn Cys 150

Gln Thr Phe Asn Glu Asp Asp Ser Glu Val Gly Lys Ala Gly His Ile 165

Met Arg Arg Phe Phe Glu Ser Arg Trp Glu Glu Phe Tyr Gln Gly Lys 180

Gln Ala Asn Leu 195

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<210> 95
<211> 20
<212> PRT
<213> Homo sapiens
<400> 95
Met Glu Ala Val Pro Glu Gly Asp Trp Phe Cys Thr Val Cys Leu Ala
                                                          15
                                     10
  1
Gln Gln Val Glu
             20
<210> 96
<211> 21
<212> PRT
<213> Homo sapiens
<400> 96
Gly Glu Phe Thr Gln Lys Pro Gly Phe Pro Lys Arg Gly Gln Lys Arg
                                     10
                  5
 1
Lys Ser Gly Tyr Ser
             20
<210> 97
<211> 21
<212> PRT
<213> Homo sapiens
<400> 97
Leu Asn Phe Ser Glu Gly Asp Gly Arg Arg Arg Arg Val Leu Leu Arg
                                                          15
  1
Gly Arg Glu Ser Pro
             20
<210> 98.
<211> 20
<212> PRT
<213> Homo sapiens
<400> 98
Ala Ala Gly Pro Arg Tyr Ser Glu Glu Gly Leu Ser Pro Ser Lys Arg
                                      10
                  5
  1
Arg Arg Leu Ser
             20
<210> 99
<211> 21
<212> PRT
<213> Homo sapiens
<400> 99
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Met Arg Asn His His Ser Asp Leu Thr Phe Cys Glu Ile Ile Leu Met
  1
Glu Met Glu Ser His
             20
<210> 100
<211> 20
<212> PRT
 <213> Homo sapiens
 Asp Ala Ala Trp Pro Phe Leu Glu Pro Val Asn Pro Arg Leu Val Ser
   1
 Gly Tyr Arg Arg
              20
 <210> 101
 <211> 21
 <212> PRT
  <213> Homo sapiens
  Ile Ile Lys Asn Pro Met Asp Phe Ser Thr Met Arg Glu Arg Leu Leu
                    5
    1
  Arg Gly Gly Tyr Thr
                20
   <210> 102
  <211> 21
   <212> PRT
   <213> Homo sapiens
   Ser Ser Glu Glu Phe Ala Ala Asp Ala Leu Leu Val Phe Asp Asn Cys
   <400> 102
     1
   Gln Thr Phe Asn Glu
                 20
    <210> 103
    <211> 17
    <212> PRT
    <213> Homo sapiens
    Asp Asp Ser Glu Val Gly Lys Ala Gly His Ile Met Arg Arg Phe Phe
                       5
      1
    Glu
```

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<210> 104
<211> 14
<212> PRT
<213> Homo sapiens
<400> 104
Ser Arg Trp Glu Glu Phe Tyr Gln Gly Lys Gln Ala Asn Leu
                                     10
<210> 105
<211> 35
<212> PRT
<213> Homo sapiens
<400> 105
Met Ser Glu Ile Tyr Leu Arg Cys Gln Asp Glu Gln Gln Tyr Ala Arg
                                                          15
                                     10
                  5
Trp Met Ala Gly Cys Arg Leu Ala Ser Lys Gly Arg Thr Met Ala Asp
                                                      30
                                  25
             20.
Ser Ser Tyr
         35
<210> 106
<211> 45
<212> PRT
<213> Homo sapiens
<400> 106
Leu Val Ala Pro Arg Phe Gln Arg Lys Phe Lys Ala Lys Gln Leu Thr
                                                          15
                                      10
  1
Pro Arg Ile Leu Glu Ala His Gln Asn Val Ala Gln Leu Ser Leu Ala
                                                      30
                                  25
             20
Glu Ala Gln Leu Arg Phe Ile Gln Ala Trp Gln Ser Leu
                              40
         35
<210> 107
<211> 23
<212> PRT
<213> Homo sapiens
<400> 107
Val Gly Asp Val Val Lys Thr Trp Arg Phe Ser Asn Met Arg Gln Trp
                                                          15
                                      10 .
Asn Val Asn Trp Asp Ile Arg
              20
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<210> 108 <211> 26

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<212> PRT
 <213> Homo sapiens
 <400> 108
 Glu Glu Ile Asp Cys Thr Glu Glu Glu Met Met Val Phe Ala Ala Leu
                                     10
                                                           15
                    5
   1
 Gln Tyr His Ile Asn Lys Leu Ser Gln Ser
               20
 <210> 109
 <211> 26
 <212> PRT '
 <213> Homo sapiens
 <400> 109
 Glu Glu Ile Asp Cys Thr Glu Glu Glu Met Met Val Phe Ala Ala Leu
                                       10
   1
 Gln Tyr His Ile Asn Lys Leu Ser Gln Ser
             20
 <210> 110
 <211> 26
 <212> PRT
 <213> Homo sapiens
 <400> 110
 Lys Glu Leu Ser Phe Ala Arg Ile Lys Ala Val Glu Cys Val Glu Ser
                                                           15
                                       10
   1
                    5
 Thr Gly Arg His Ile Tyr Phe Thr Leu Val
                                   -25
               20
 <210> .111
<211> 17
 <212> PRT
 <213> Homo sapiens
 <400> 111
 Gly Trp Asn Ala Gln Ile Thr Leu Gly Leu Val Lys Phe Lys Asn Gln
                                                           15
                                       10
 Gln
 <210> 112
 <211> 217
 <212> PRT
 <213> Homo sapiens
 <220>
 <221> SITE
 <222> (82)
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<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (83)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
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<223> Xaa equals any of the naturally occurring L-amino acids
<220>
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<222> (194)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 112
Met Val Thr Thr Ile Val Leu Gly Arg Arg Phe Ile Gly Ser Ile Val
                   5
                                      10
                                                          15
  1
Lys Glu Ala Ser Gln Arg Gly Lys Val Ser Leu Phe Arg Ser Ile Leu
             20
                                  25
Leu Phe Leu Thr Arg Phe Thr Val Leu Thr Ala Thr Gly Trp Ser Leu
         35
                                                  45
Cys Arg Ser Leu Ile His Leu Phe Arg Thr Tyr Ser Phe Leu Asn Leu
     50
                          55
                                              60
Leu Phe Leu Cys Tyr Pro Phe Gly Met Tyr Ile Pro Phe Leu Gln Leu
                                                             80
                                          75
 65
                     70
Asn Xaa Xaa Leu Arg Lys Thr Ser Leu Phe Asn His Met Ala Ser Met
                                                          95
                 85
                                      90
Gly Pro Arg Glu Ala Val Ser Gly Leu Ala Lys Ser Arg Asp Tyr Leu
                                 105
                                                     110
            100
Leu Thr Leu Arg Glu Thr Trp Lys Gln His Xaa Arg Gln Leu Tyr Gly
                             120
        115
Pro Asp Ala Met Pro Thr His Ala Cys Cys Leu Ser Pro Ser Leu Ile
                                             140
                         135
    130
Arg Ser Glu Val Glu Phe Leu Lys Met Asp Phe Asn Trp Arg Met Lys
                                        155
145
                    150
Glu Val Leu Val Ser Ser Met Leu Ser Ala Tyr Tyr Val Ala Phe Val
                                     170
                165
Pro Val Trp Phe Val Lys Asn Thr His Tyr Tyr Asp Lys Arg Trp Ser
                                                     190
                                185
          · 180
Cys Xaa Thr Leu Pro Ala Gly Val His Gln His Leu Arg Asp Pro His
                                                 205
                            200
        195
```

Ala Ala Pro Ala Ala Cys Gln Leu Leu

<210> 113

<211> 26

<212> PRT

<213> Homo sapiens

<400> 113

Met Val Thr Thr Ile Val Leu Gly Arg Arg Phe Ile Gly Ser Ile Val 1 5 10 15

Lys Glu Ala Ser Gln Arg Gly Lys Val Ser 20 25

<210> 114

<211> 23

<212> PRT

<213> Homo sapiens

<400> 114

Leu Phe Arg Ser Ile Leu Leu Phe Leu Thr Arg Phe Thr Val Leu Thr
1 10 15

Ala Thr Gly Trp Ser Leu Cys 20

<210> 115

<211> 30

<212> PRT

<213> Homo sapiens

<400> 115

Arg Ser Leu Ile His Leu Phe Arg Thr Tyr Ser Phe Leu Asn Leu Leu
1 5 10 15

Phe Leu Cys Tyr Pro Phe Gly Met Tyr Ile Pro Phe Leu Gln
20 25 30

<210> 116

<211> 30

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (3)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (4)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 116

```
Leu Asn Xaa Xaa Leu Arg Lys Thr Ser Leu Phe Asn His Met Ala Ser
                    5
                                                           15
                                       10
 Met Gly Pro Arg Glu Ala Val Ser Gly Leu Ala Lys Ser Arg
              20
                                   25
 <210> 117
 <211> 30
 <212> PRT
 <213> Homo sapiens
 <220>
 <221> SITE
 <222> (14)
 <223> Xaa equals any of the naturally occurring L-amino acids
 Asp Tyr Leu Leu Thr Leu Arg Glu Thr Trp Lys Gln His Xaa Arg Gln
   1
                                      10
                                                           15
 Leu Tyr Gly Pro Asp Ala Met Pro Thr His Ala Cys Cys Leu
              20
                                  25
 <210> 118
 <211> 31
 <212> PRT
 <213> Homo sapiens
 <400> 118
 Ser Pro Ser Leu Ile Arg Ser Glu Val Glu Phe Leu Lys Met Asp Phe
                                                          15
                   5.
                                      10
   1
 Asn Trp Arg Met Lys Glu Val Leu Val Ser Ser Met Leu Ser Ala
                                  25
              20
 <210> 119
 <211> 27
 <212> PRT
 <213> Homo sapiens
<220>
<221> SITE
<222> (24)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 119
Tyr Tyr Val Ala Phe Val Pro Val Trp Phe Val Lys Asn Thr His Tyr
                                                          15
                                      10
  1
                   5.
Tyr Asp Lys Arg Trp Ser Cys Xaa Thr Leu Pro
                                  25
              20
```

<210> 120 <211> 20

```
<212> PRT
<213> Homo sapiens
<400> 120
Ala Gly Val His Gln His Leu Arg Asp Pro His Ala Ala Pro Ala Ala
                                     10
  1
Cys Gln Leu Leu
             20
<210> 121
<211> 16
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (7)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 121
Leu Val Leu Gly Leu Ser Xaa Leu Asn Asn Ser Tyr Asn Phe Ser Phe
                                                          15
                                      10
  1
<210> 122
<211> 17
<212> PRT
<213> Homo sapiens
<400> 122
His Val Val Ile Gly Ser Gln Ala Glu Glu Gly Gln Tyr Ser Leu Asn
                                      10
                  5
  1
Phe
<210> 123
<211> 19
<212> PRT
<213> Homo sapiens
<400> 123
His Asn Cys Asn Asn Ser Val Pro Gly Lys Glu His Pro Phe Asp Ile
                                      10
                  5
  1
Thr Val Met
```

<210> 124 <211> 17 <212> PRT

```
<213> Homo sapiens
<400> 124
Phe Ile Lys Tyr Val Leu Ser Asp Lys Glu Lys Lys Val Phe Gly Ile
                                     10
                                                         15
                  5
  1
Val
<210> 125
<211> 13
<212> PRT
<213> Homo sapiens
<400> 125
Ile Pro Met Gln Val Leu Ala Asn Val Ala Tyr Ile Ile
                  5
                                     10
 1
<210> 126
<211> 13
<212> PRT
<213> Homo sapiens
<400> 126
Ile Pro Met Gln Val Leu Ala Asn Val Ala Tyr Ile Ile
                                     10
                  5
 1
<210> 127
<211> 15
<212> PRT
<213> Homo sapiens
<400> 127
Asp Gly Lys Val Ala Val Asn Leu Ala Lys Leu Lys Leu Phe Arg
                                                         15
                                     10
                  5
  1
<210> 128
<211> 13
<212> PRT
<213> Homo sapiens
<400> 128
Ile Arg Glu Lys Asn Pro Asp Gly Phe Leu Ser Ala Ala
                                     10
                  5
 1
<210> 129
<211> 9
<212> PRT
<213> Homo sapiens
<400> 129
Met Met Phe Gly Gly Tyr Glu Thr Ile
  1
                  5
```

```
<210> 130
 <211> 24
 <212> PRT
 <213> Homo sapiens
 <400> 130
 Tyr Arg Asp Glu Ser Ser Ser Glu Leu Ser Val Asp Ser Glu Val Glu
                  5
  1
                                    10
 Phe Gln Leu Tyr Ser Gln Ile His
<210> 131
<211> 136
<212> PRT
<213> Homo sapiens
<400> 131
Tyr Ala Gln Asp Leu Asp Asp Val Ile Arg Glu Glu Glu His Glu Glu
                                                       15
  1
                                    10
Lys Asn Ser Gly Asn Ser Glu Ser Ser Ser Ser Lys Pro Asn Gln Lys
             20
                                25
Lys Leu Ile Val Leu Ser Asp Ser Glu Val Ile Gln Leu Ser Asp Gly
                            40 .
         35
                                               45
Ser Glu Val Ile Thr Leu Ser Asp Glu Asp Ser Ile Tyr Arg Cys Lys
     50
                        55
Gly Lys Asn Val Arg Val Gln Ala Gln Glu Asn Ala His Gly Leu Ser
                                        75
                                                           80
 65
                     70
Ser Ser Leu Gln Ser Asn Glu Leu Val Asp Lys Lys Cys Lys Ser Asp
                                                       95
                 85
                                    90
Ile Glu Lys Pro Lys Ser Glu Glu Arg Ser Gly Val Ile Arg Glu Val
                               105
Met Ile Ile Glu Val Ser Ser Ser Glu Glu Glu Glu Ser Thr Ile Ser
                                              125
                           120
        115
Glu Gly Asp Asn Val Glu Ser Trp
    130
<210> 132
<211> 37
<212> PRT
<213> Homo sapiens
<400> 132
Met Leu Leu Gly Cys Glu Val Asp Asp Lys Asp Asp Ile Leu Leu
                                   1 . 5
```

```
Asn Leu Val Gly Cys Glu Asn Ser Val Thr Glu Gly Glu Asp Gly Ile
              20
                                  25
 Asn Trp Ser Ile Ser
          35
<210> 133
<211> 18
<212> PRT
<213> Homo sapiens
<400> 133
Asp Lys Asp Ile Glu Ala Gln Ile Ala Asn Asn Arg Thr Pro Gly Arg
  1
                                      10
                                                           15
Trp Thr
<210> 134
<211> 31
<212> PRT
<213> Homo sapiens
<400> 134
Gln Arg Tyr Tyr Ser Ala Asn Lys Asn Ile Ile Cys Arg Asn Cys Asp
  1
                   5
                                      10
                                                          15
Lys Arg Gly His Leu Ser Lys Asn Cys Pro Leu Pro Arg Lys Val
             20
                                  25
                                                      30
<210> 135
<211> 179
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (120)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (139)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 135
Arg Arg Cys Phe Leu Cys Ser Arg Arg Gly His Leu Leu Tyr Ser Cys
                                                          15
Pro Ala Pro Leu Cys Glu Tyr Cys Pro Val Pro Lys Met Leu Asp His
                                 25
             20
Ser Cys Leu Phe Arg His Ser Trp Asp Lys Gln Cys Asp Arg Cys His
         35
                             40
```

Met Leu Gly His Tyr Thr Asp Ala Cys Thr Glu Ile Trp Arg Gln Tyr 50 55 60

His Leu Thr Thr Lys Pro Gly Pro Pro Lys Lys Pro Lys Thr Pro Ser 70 75 80

Arg Pro Ser Ala Leu Ala Tyr Cys Tyr His Cys Ala Gln Lys Gly His
85 90 95

Tyr Gly His Glu Cys Pro Glu Arg Glu Val Tyr Asp Pro Ser Pro Val
100 105 110

Ser Pro Phe Ile Cys Tyr Tyr Xaa Asp Lys Tyr Glu Ile Gln Glu Arg 115 120 125

Glu Lys Arg Leu Lys Gln Lys Ile Lys Val Xaa Lys Lys Asn Gly Val
130 135 140

Ile Pro Glu Pro Ser Lys Leu Pro Tyr Ile Lys Ala Ala Asn Glu Asn 145 150 155 160

Pro His His Asp Ile Arg Lys Gly Arg Ala Ser Trp Lys Ser Asn Arg 165 170 175

Trp Pro Gln

<210> 136

<211> 416

<212> PRT

<213> Homo sapiens

<400> 136

Met Ser Phe Pro Pro His Leu Asn Arg Pro Pro Met Gly Ile Pro Ala 1 5 10 15

Leu Pro Pro Gly Ile Pro Pro Pro Gln Phe Pro Gly Phe Pro Pro Pro 20 25 30

Val Pro Pro Gly Thr Pro Met Ile Pro Val Pro Met Ser Ile Met Ala 35 40 45

Pro Ala Pro Thr Val Leu Val Pro Thr Val Ser Met Val Gly Lys His
50 55 60

Leu Gly Ala Arg Lys Asp His Pro Gly Leu Lys Ala Lys Glu Asn Asp 65 70 75 80

Glu Asn Cys Gly Pro Thr Thr Thr Val Phe Val Gly Asn Ile Ser Glu 85 90 95

Lys Ala Ser Asp Met Leu Ile Arg Gln Leu Leu Ala Lys Cys Gly Leu 100 105 110

Val Leu Ser Trp Lys Arg Val Gln Gly Ala Ser Gly Lys Leu Gln Ala 115 120 125 Phe Gly Phe Cys Glu Tyr Lys Glu Pro Glu Ser Thr Leu Arg Ala Leu 130

Arg Leu Leu His Asp Leu Gln Ile Gly Glu Lys Lys Leu Leu Val Lys
150
145

Val Asp Ala Lys Thr Lys Ala Gln Leu Asp Glu Trp Lys Ala Lys Lys 175

Lys Ala Ser Asn Gly Asn Ala Arg Pro Glu Thr Val Thr Asn Asp Asp 180

Glu Glu Ala Leu Asp Glu Glu Thr Lys Arg Arg Asp Gln Met Ile Lys
195

Gly Ala Ile Glu Val Leu Ile Arg Glu Tyr Ser Ser Glu Leu Asn Ala 210

Pro Ser Gln Glu Ser Asp Ser His Pro Arg Lys Lys Lys Lys Glu Lys 240 225

Lys Glu Asp Ile Phe Arg Arg Phe Pro Val Ala Pro Leu Ile Pro Tyr 255

Pro Leu Ile Thr Lys Glu Asp Ile Asn Ala Ile Glu Met Glu Glu Asp 270

Lys Arg Asp Leu Ile Ser Arg Glu Ile Ser Lys Phe Arg Asp Thr His 275

Lys Lys Leu Glu Glu Glu Lys Gly Lys Lys Glu Lys Glu Arg Gln Glu 295

Ile Glu Lys Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg 320 305

Glu Arg Glu 335

Lys Glu Lys Glu Arg Glu Arg Glu Arg Glu Arg Asp Arg Asp Arg Asp 350

Arg Thr Lys Glu Arg Asp Arg Asp Arg Asp Arg Glu Arg Asp Arg Asp 365

Arg Asp Arg Glu Arg Ser Ser Asp Arg Asn Lys Asp Arg Ile Arg Ser

Arg Glu Lys Ser Arg Asp Arg Glu Arg Gl

Arg Glu Arg H15

```
<210> 137
<211> 43
<212> PRT
<213> Homo sapiens
<400> 137
Met Ser Phe Pro Pro His Leu Asn Arg Pro Pro Met Gly Ile Pro Ala
                                                          15
                                      10
                  5
  1
Leu Pro Pro Gly Ile Pro Pro Pro Gln Phe Pro Gly Phe Pro Pro Pro
                                  25
             20
Val Pro Pro Gly Thr Pro Met Ile Pro Val Pro
                              40
         35
<210> 138
<211> 35
<212> PRT
<213> Homo sapiens
<400> 138
Met Ser Ile Met Ala Pro Ala Pro Thr Val Leu Val Pro Thr Val Ser
                                      10
                  5
  1
Met Val Gly Lys His Leu Gly Ala Arg Lys Asp His Pro Gly Leu Lys
                                  25
             20
Ala Lys Glu
         35
<210> 139
<211> 41
<21:2> PRT
<213> Homo sapiens
<400> 139
Asn Asp Glu Asn Cys Gly Pro Thr Thr Thr Val Phe Val Gly Asn Ile
                                                          15
Ser Glu Lys Ala Ser Asp Met Leu Ile Arg Gln Leu Leu Ala Lys Cys
                                 25
             20
Gly Leu Val Leu Ser Trp Lys Arg Val
         35
<210> 140
<211> 40
<212> PRT
<213> Homo sapiens
<400> 140
Gln Gly Ala Ser Gly Lys Leu Gln Ala Phe Gly Phe Cys Glu Tyr Lys
                                                          15
                                      10
                  5
Glu Pro Glu Ser Thr Leu Arg Ala Leu Arg Leu Leu His Asp Leu Gln
```

Ile Gly Glu Lys Lys Leu Leu Val 35

<210> 141

<211> 39

<212> PRT

<213> Homo sapiens

Lys Val Asp Ala Lys Thr Lys Ala Gln Leu Asp Glu Trp Lys Ala Lys

Lys Lys Ala Ser Asn Gly Asn Ala Arg Pro Glu Thr Val Thr Asn Asp 20

Asp Glu Glu Ala Leu Asp Glu • 35

<210> 142

<211> 40

<212> PRT

<213> Homo sapiens

Glu Thr Lys Arg Arg Asp Gln Met Ile Lys Gly Ala Ile Glu Val Leu

Ile Arg Glu Tyr Ser Ser Glu Leu Asn Ala Pro Ser Gln Glu Ser Asp 20

Ser His Pro Arg Lys Lys Lys 40 35

<210> 143

<211> 44

<212> PRT

<213> Homo sapiens

Glu Lys Lys Glu Asp Ile Phe Arg Arg Phe Pro Val Ala Pro Leu Ile

Pro Tyr Pro Leu Ile Thr Lys Glu Asp Ile Asn Ala Ile Glu Met Glu

Glu Asp Lys Arg Asp Leu Ile Ser Arg Glu Ile Ser 35

<210> 144

<211> 41

<212> PRT

<213> Homo sapiens

```
Lys Phe Arg Asp Thr His Lys Lys Leu Glu Glu Glu Lys Gly Lys
```

Glu Lys Glu Arg Gln Glu Ile Glu Lys Glu Arg Arg Glu Arg Glu Arg 20

Glu Arg Glu Arg Glu Arg Arg 35

<210> 145

<211> 93

<212> PRT

<213> Homo sapiens

Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Lys

Glu Arg Glu Arg Glu Arg Glu Arg Asp Arg Asp Arg Asp Arg Thr Lys

Glu Arg Asp Arg Asp Arg Asp Arg Glu Arg Asp Arg Asp Arg Asp Arg

Glu Arg Ser Ser Asp Arg Asn Lys Asp Arg Ile Arg Ser Arg Glu Lys

Ser Arg Asp Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg

Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu 85

<210> 146

<211> 52

<212> PRT

<213> Homo sapiens

Arg Asp Arg Asp Arg Glu Arg Ser Ser Asp Arg Asn Lys Asp

Arg Ile Arg Ser Arg Glu Lys Ser Arg Asp Arg Glu Arg Glu Arg Glu

Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu Arg Glu -35

Arg Glu Arg Glu 50

<210> 147 <211> 22

```
<212> PRT
 <213> Homo sapiens
 <400> 147
 Lys Pro Gln Met Glu Gly Arg Leu Val Gly Gly Gly Ser Phe Ser
   1
                   5
                                                          15
 Ser Arg Gly Arg His Pro
           20
<210> 148
<211> 25
<212> PRT
<213> Homo sapiens
<400> 148
Leu Leu Val Pro Ser Pro Ser Leu Leu Pro Ala Val Ser Ser Tyr His
                   5
                                     10
                                                          15
Leu Pro Leu Gly Arg Gly Leu Ile Arg
             20
                                 25
<210> 149
<211> 23
<212> PRT
<213> Homo sapiens
<400> 149
Glu Gln Gly Ser Ala Val Arg Ser Pro Ala Phe Pro Val Arg Gln Ala
  1
                  5
                                     10
                                                         15
Trp Leu Pro Cys Ser Gly Ser
             20
<210> 150
<211> 151
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (123)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 150
Met Gly Leu Asn Pro Pro Gly Leu Thr Ser Ala Leu Lys Pro Gln Met
                                     10
                                                         15
Glu Gly Arg Leu Val Gly Gly Gly Ser Phe Ser Ser Arg Gly Arg
             20
                                 25
                                                     30
His Pro Ala Gly Trp Val Leu Pro Gln Pro Cys Leu Leu Leu Ser Pro
         35
                                                 45
```

Thr Leu Ser Phe Pro Pro Ala Cys Gly Leu Leu Val Pro Ser Pro Ser

Leu Leu Pro Ala Val Ser Ser Tyr His Leu Pro Leu Gly Arg Gly Leu 70

Ile Arg Pro Ala Phe Lys Ile Lys Val Cys Ser Lys Leu Thr Val Trp 85

Cys Ser Leu Pro Ser Pro Ser Arg Trp Arg Cys Cys His Gly Asn Ala

Val Ala Leu Pro Ala Leu Gly Pro Trp Arg Xaa Trp Glu Gln Gly Ser

Ala Val Arg Ser Pro Ala Phe Pro Val Arg Gln Ala Trp Leu Pro Cys 130

Ser Gly Ser Leu Thr Ser Trp 150 145

<210> 151

<211> 64

<212> PRT

<213> Homo sapiens

Asn Val Thr Lys Ile Thr Leu Glu Ser Phe Leu Ala Trp Lys Lys Arg 5

Lys Arg Gln Glu Lys Ile Asp Lys Leu Glu Gln Asp Met Glu Arg Arg

Lys Ala Asp Phe Lys Ala Gly Lys Ala Leu Val Ile Ser Gly Arg Glu

Val Phe Glu Phe Arg Pro Glu Leu Val Asn Asp Asp Asp Glu Glu Ala 50.

<210> 152

<211> 22

<212> PRT

<213> Homo sapiens

Glu Arg Arg Lys Ala Asp Phe Lys Ala Gly Lys Ala Leu Val Ile Ser 5 1

Gly Arg Glu Val Phe Glu 20

<210> 153 <211> 89

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<212> PRT
 <213> Homo sapiens
 <220>
<221> SITE
<222> (81)
 <223> Xaa equals any of the naturally occurring L-amino acids
<400> 153
Met Cys Asp Glu Leu Pro Gly Glu Gly Arg Trp Glu Pro Gly Gln Asp
  1
                   5
                                                          15
Arg Lys Leu Cys Leu Ser Phe Pro Leu Gly Thr Pro Ala Arg Pro Ile
              20
                                  25
Lys Ser Val Cys Pro Thr Leu Leu Ser Leu Val Phe Leu Ser Arg Gly
         35
                              40
                                                  45 '
Met Glu Gln Arg Val Arg Glu Ala Val Ala Val Ser Thr Ser Ala Pro
     50
                    . 55
Ala Pro Ser Ala Ser Glu Pro Phe Leu Ser Trp Gly Met Gly Leu Ala
 65
                     70
                                          75
Xaa Phe Ser Phe Pro Phe Leu Tyr Leu
                 85
<210> 154
<211> 95
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (71)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 154
Gly Ala Ser Leu Gly Ser Ser Ser Cys Pro Ser His Ser Trp Trp
                                     10
  1
                                                         15
Gly Gln Arg Ser Val Cys Arg Glu Thr Ala Ser Pro Leu Pro Arg Trp
           ` 20
                                 25
Met Leu Tyr Leu Asp Gly Leu Ala Thr Ser His Phe Leu His His Pro
                                                 45
         35
                             40
Glu Pro His Leu Leu Pro Ser Pro Gly Val Phe Thr Arg Leu Cys Cys
     50
                         55
His Leu Cys Pro Gly His Xaa Ser Leu Ser Gly Cys Val Met Asn Ser
                                        75
                     70
65
Gln Glu Arg Glu Asp Gly Ser Gln Gly Lys Ile Gly Ser Ser Ala
```

90

85

```
<210> 155
<211> 125
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (30)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (115)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 155
Thr Ser Val Leu Ser Ser Ser Ser Val Tyr Cys Met Gln Ala Arg Lys
                                                          15
                                      10
Leu Ser Val Ser Gln Arg Tyr Arg Lys Gly Lys Glu Lys Xaa Ala Arg
                                  25
                                                      30
              20
Pro Ile Pro Gln Glu Arg Lys Gly Ser Asp Ala Glu Gly Ala Gly Ala
                                                  45
         35
                              40
Glu Val Glu Thr Ala Thr Ala Ser Leu Thr Leu Cys Ser Ile Pro Leu
     50
                          55
                                              60
Leu Lys Lys Thr Arg Leu Ser Arg Val Gly Gln Thr Leu Phe Ile Gly
                                                              80
                     70
                                          75
 65
Leu Ala Gly Val Pro Ser Gly Lys Leu Arg Gln Ser Phé Leu Ser Cys
                  85
                                      90
Pro Gly Ser His Leu Pro Ser Pro Gly Ser Ser Ser His Ile Pro Arg
            100
                                 105
                                                     110
Gly Lys Xaa Val Leu Gly Arg Gly Gly Ser Lys Ala Gly
       115
                                                 125
                             120
<210> 156
<211> 125
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (13)
<223> Xaa equals any of the naturally occurring L-amino acids
<220> .
<221> SITE
<222> (97)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 156
Ala Leu Val Lys Gly Thr Gly Arg Glu Lys Arg Arg Xaa Gln Gly Pro
```

1 5 10 15 Ser Pro Lys Lys Gly Arg Ala Leu Met Gln Arg Glu Gln Glu Leu Arg 20 25 Trp Arg Arg Pro Leu Pro Leu Ser Pro Ser Val Pro Ser Leu Cys Ser 35 40 45 Arg Lys Pro Gly Leu Ala Glu Trp Asp Arg Arg Phe Leu Leu Val Trp 50 55 Leu Ala Cys Leu Val Glu Ser Ser Gly Arg Ala Ser Tyr Leu Ala Leu 65 70 75 Ala Pro Ile Phe Pro Leu Leu Gly Val His His Thr Ser Arg Glu Gly 85 90 95 Xaa Val Ser Trp Ala Glu Val Ala Ala Lys Pro Gly Lys Asn Ser Arg 100 105 110 Ala Gly Lys Gln Met Gly Leu Arg Val Met Gln Lys Met 125 115 120 <210> 157 <211> 32 <212> PRT <213> Homo sapiens <400> 157 Ser Phe Pro Leu Gly Thr Pro Ala Arg Pro Ile Lys Ser Val Cys Pro 10 1 Thr Leu Leu Ser Leu Val Phe Leu Ser Arg Gly Met Glu Gln Arg Val 20 25 <210> 158 <211> 31 <212> PRT <213> Homo sapiens <400> 158 Thr Ala Ser Pro Leu Pro Arg Trp Met Leu Tyr Leu Asp Gly Leu Ala 15 1 5 10 Thr Ser His Phe Leu His His Pro Glu Pro His Leu Leu Pro Ser 20 25

<210> 159 <211> 31 <212> PRT

<213> Homo sapiens

<400> 159

```
Arg Lys Gly Ser Asp Ala Glu Gly Ala Gly Ala Glu Val Glu Thr Ala
                                                          15
  1
                   5
                                      10
Thr Ala Ser Leu Thr Leu Cys Ser Ile Pro Leu Leu Lys Lys Thr
                                  25
                                                      30
              20
<210> 160
<211> 25
<212> PRT
<213> Homo sapiens
<400> 160
Gln Arg Glu Gln Glu Leu Arg Trp Arg Arg Pro Leu Pro Leu Ser Pro
  1 .
                   5
                                      10
                                                          15
Ser Val Pro Ser Leu Cys Ser Arg Lys
              20
<210> 161
<211> 29
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (13)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 161
Pro Leu Gly Val His His Thr Ser Arg Glu Gly Xaa Val Ser Trp
                  5
                                     10
  1
Ala Glu Val Ala Ala Lys Pro Gly Lys Asn Ser Arg Ala
                                  25
             20
<210> 162
<211> 73
<212> PRT
<213> Homo sapiens
<400> 162
Met Ser Val Leu Lys Gly Glu Arg Gln Gln Thr Leu Ala Leu Ala Val
                                                          15
                                      10
  1
Leu Ser Val Ala Lys Glu Asn Ala Arg Asp Val Cys Cys Leu Gln Gly
                                  25
             20
Trp Gln Asp Thr Ser Cys Arg Asp Thr Ser Cys Ala Ala Leu Arg Gly
                                                  45
                             40
         35
Gly Leu Gln Thr Leu Phe Pro Ala Pro Val His Phe Arg Cys Gly Gly
                                              60
                         55
     50
```

Pro Ala Glu Leu Lys Gly Arg Gly Ser

<210> 163

<211> 68

<212> PRT

<213> Homo sapiens

<400> 163

Ala His Ser Phe Thr Thr Pro Glu Glu Ala Arg Gly Ala Gly Ser Met

1 5 10 15

Gly Cys Arg Phe Pro Phe Lys His Thr His Ser Pro His Pro Arg Arg 20 25 30

Pro Glu Val Gln Gly Ala Trp Ala Gly Cys Thr Ser Ala Gly Glu Lys
35 40 45

Ala Glu Pro Pro Pro Ser Arg Glu Pro Gly Ser Gln Ala Ser Arg Phe 50 55 60

Pro Leu Pro Pro 65

<210> 164

<211> 25

<212> PRT

<213> Homo sapiens

<400> 164

Gly Trp Gln Asp Thr Ser Cys Arg Asp Thr Ser Cys Ala Ala Leu Arg
1 5 10 15

Gly Gly Leu Gln Thr Leu Phe Pro Ala 20 25

<210> 165

<211> 24

<212> PRT

<213> Homo sapiens

<400> 165

Gly Cys Arg Phe Pro Phe Lys His Thr His Ser Pro His Pro Arg Arg

1 5 10 15

Pro Glu Val Gln Gly Ala Trp Ala

20

<210> 166

<211> 81

<212> PRT

<213> Homo sapiens

<400> 166

Pro His Gln Val Glu Gly Arg Leu Gly Thr Met Glu Thr Trp Asp Ser

15 10 Ser His Glu Gly Leu Leu His Cys Arg Ile Pro Leu Lys Gly Ser Trp Val Gln Glu Pro Ser Cys Gln Tyr Gln Trp Arg Arg Thr Arg Cys Met Gly Ile Pro Pro Ala Thr Ser Gly Trp Pro Cys Arg Ala Pro Ala Phe Leu Cys Ala Arg Ala Glu Phe Pro Ala Ser Pro Gly Gly Ser Thr Asn 65 Phe <210> 167 <211> 81 <212> PRT <213> Homo sapiens Leu Val Thr Pro Pro Ser Gly Gly Glu Thr Gly Asp His Gly Asn Met Gly Gln Leu Pro Arg Arg Ala Leu Ala Leu Gln Asn Ser Thr Gln Gly Ile Leu Gly Pro Gly Ala Glu Leu Pro Val Ser Val Glu Lys Asp Lys Val His Gly Asp Pro Ala Ser Asn Ile Arg Met Ala Met Pro Gly Thr Arg Phe Pro Leu Cys Ser Cys Arg Ile Pro Cys Gln Pro Gly Gly Ile 65 His <210> 168 <211> 32 <212> PRT <213> Homo sapiens Glu Gly Leu Leu His Cys Arg Ile Pro Leu Lys Gly Ser Trp Val Gln <400> 168 Glu Pro Ser Cys Gln Tyr Gln Trp Arg Arg Thr Arg Cys Met Gly Ile 20

```
<210> 169
  <211> 29
  <212> PRT
  <213> Homo sapiens
  <400> 169
 Gln Asn Ser Thr Gln Gly Ile Leu Gly Pro Gly Ala Glu Leu Pro Val
                                                            15
                                        10
                    5
  Ser Val Glu Lys Asp Lys Val His Gly Asp Pro Ala Ser
                                    25
               20
  <210> 170
  <211> 42
  <212> PRT
  <213> Homo sapiens
  <400> 170
  Phe Gly Thr Arg Lys Lys Tyr His Leu Cys Met Ile Pro Asn Leu Asp
                                                            15
                                        10
                    5
    1
Leu Asn Leu Asp Arg Asp Leu Val Leu Pro Asp Val Ser Tyr Gln Val
                                                        30
                                    25
               20
  Glu Ser Ser Glu Glu Asp Gln Ser Gln Thr
                                40
           35
  <210> 171
  <211> 115
  <212> PRT
  <213> Homo sapiens
  <220>
  <221> SITE
  <222> (88)
  <223> Xaa equals any of the naturally occurring L-amino acids
  <400> 171
  Phe Leu Leu Ser Leu Gly Ser Leu Val Met Leu Leu Gln Asp Leu Val
                                        10
    1
  His Ser Glu Leu Asp Gly Thr Leu His Tyr Thr Val Ala Leu His Lys
                                                         30
                                    25
                20
  Asp Gly Ile Glu Met Ser Cys Glu Gln Ser Ile Asp Ser Pro Asp Phe
                                                    45
                                40
           35
  His Leu Leu Asp Trp Lys Cys Thr Val Glu Ile His Lys Glu Lys Lys
                            55
       50
  Gln Gln Ser Leu Ser Leu Arg Ile His Ser Leu Arg Leu Ile Leu Leu
                                            75
                        70
   65
  Thr Gly Phe His Leu Ile Thr Xaa Ile Trp Lys His Gln Ile Ser Ile
                                                             95
```

85

```
Gln Ile Glu Ile Gln Ile Gly Tyr His Thr Gln Met Val Phe Pro
                                                    110
                                105
            100
Arg Ala Glu
        115
<210> 172
<211> 26
<212> PRT
<213> Homo sapiens
<400> 172
Val His Ser Glu Leu Asp Gly Thr Leu His Tyr Thr Val Ala Leu His
                                                         15
                                     10
  1
                  5
Lys Asp Gly Ile Glu Met Ser Cys Glu Gln
                                 25 .
             20
<210> 173
<211> 28
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (23)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 173
Gln Ser Leu Ser Leu Arg Ile His Ser Leu Arg Leu Ile Leu Leu Thr
                                                         15
                                     10
  1
Gly Phe His Leu Ile Thr Xaa Ile Trp Lys His Gln
                                 25
             20
<211> 340
<212> PRT
<213> Homo sapiens
<400> 174
Met Ala Ala Cys Gly Pro Gly Ala Ala Gly Thr Ala Cys Ser Ser
                                                          15
                                     10
  1
Ala Cys Ile Cys Phe Cys Asp Arg Gly Pro Cys Leu Gly Trp Asn Asp
                                  25
             20
Pro Asp Arg Met Leu Leu Arg Asp Val Lys Ala Leu Thr Leu His Tyr
                                                  45
         35
Asp Arg Tyr Thr Thr Ser Arg Ser Trp Ile Pro Ser His Ser Pro Gln
                                              60
                         55
     50
Leu Lys Cys Val Gly Gly Thr Ala Gly Cys Asp Ser Tyr Thr Pro Lys
```

•	75	80
65 70		yr Asp Val Gln Trp
Val Ile Gln Cys Gln Asn Ly	s Gly Tip Asp 90	95 mb = Val
Glu Cys Lys Thr Asp Leu As	p Ile Ala Tyr Lys P 105	he Gly Lys Thi vai
Val Ser Cys Glu Gly Tyr G	lu Ser Ser Glu Asp G 120	In Tyr Val Leu Ary 125
Gly Ser Cys Gly Leu Glu T	yr Asn Leu Asp Tyr (35	Thr Glu Leu Gly Lou 140
Gln Lys Leu Lys Glu Ser G	ly Lys Gln His Gly 155	Phe Ala Ser 160
145 Asp Tyr Tyr Tyr Lys Trp 5	Ser Ser Ala Asp Ser 170	Cys Ash Met 5
Leu Ile Thr Ile Val Val	Leu Leu Gly Ile Ala 185	190 The Var Var 19
180 Leu Phe Leu Ser Asp Gly 195	Gln Tyr Ser Pro Pro 200	205
195 Pro Pro Phe Ser His Arg 210	Tyr Gln Arg Phe Thr 215	220 W. Pro Gln Asn Thr Gly
210 Pro Pro Pro Gly Phe Lys 230	Ser Glu Phe Thr Gi	240 5 Cly Gln Gln Gly
225 His Gly Ala Thr Ser Gly 245	Phe Gly Ser Ala Ph 250	ne Thr Gly Gly 255
Tyr Glu Asn Ser Gly Pr 260	o Gly Phe Trp Thr Gl 265	ly Leu Gly Thr Gly Gly 270
Tle Leu Gly Tyr Leu Ph	ie Gly Ser Asn Arg A 280	la Ala Thr Pro Phe Ser 285
Asp Ser Trp Tyr Tyr P	ro Ser Tyr Pro Pro S 295	Ser Tyr Pro Gly Thr Trp
'Asn Arg Ala Tyr Ser P	ro Leu His Gly Gly :	Ser Gly Ser Tyr Ser Val 320
Cys Ser Asn Ser Asp 7	thr Lys Thr Arg Thr	Ala Ser Gly Tyr Gly Gly 335
Thr Arg Arg Arg	·	
•		

<210> 175 <211> 24

<212> PRT

<213> Homo sapiens

```
<400> 175
Ala Cys Ser Ser Ala Cys Ile Cys Phe Cys Asp Arg Gly Pro Cys Leu
                  5
                                     10
  1
Gly Trp Asn Asp Pro Asp Arg Met
             20
<210> 176
<211> 26
<212> PRT
<213> Homo sapiens
<400> 176
Thr Ala Gly Cys Asp Ser Tyr Thr Pro Lys Val Ile Gln Cys Gln Asn
                                     10
  1
Lys Gly Trp Asp Gly Tyr Asp Val Gln Trp
                                 25
             20
<210> 177
<211> 32
<212> PRT
<213> Homo sapiens
<400> 177
Glu Tyr Asn Leu Asp Tyr Thr Glu Leu Gly Leu Gln Lys Leu Lys Glu
                                                          15
                                     10
                  5
  1
Ser Gly Lys Gln His Gly Phe Ala Ser Phe Ser Asp Tyr Tyr Lys
                                                      30
                                 25
             20
<210> 178
<211> 28
<212> PRT
<213> Homo sapiens
<400> 178
Tyr Lys Leu Phe Leu Ser Asp Gly Gln Tyr Ser Pro Pro Pro Tyr Ser
                                                          15
                                     10
 1
Glu Tyr Pro Pro Phe Ser His Arg Tyr Gln Arg Phe
             20
<210> 179
<211> 26
<212> PRT
<213> Homo sapiens
<400> 179
Glu Asn Ser Gly Pro Gly Phe Trp Thr Gly Leu Gly Thr Gly Gly Ile
```

1 5 10 15

Leu Gly Tyr Leu Phe Gly Ser Asn Arg Ala 20 25

<210> 180

<211> 25

<212> PRT

<213> Homo sapiens

<400> 180

Asn Arg Ala Tyr Ser Pro Leu His Gly Gly Ser Gly Ser Tyr Ser Val 1 5 10 15

Cys Ser Asn Ser Asp Thr Lys Thr Arg
20 25

<210> 181

<211> 124

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (30)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (31)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (32)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 181

Thr Glu Ser Gln Met Lys Cys Phe Leu Gly Asn Ser His Asp Thr Ala 1 5 10 15

Pro Arg His Thr Cys Ser Gly Gln Gly Leu His Gly Gly Xaa Xaa Xaa 20 25 30

Thr Ala Pro Leu Arg Ala Leu Gln Gln His Ser Gln Asp Gly Lys Leu
35 40 45

Cys Thr Asn Ser Leu Pro Ala Ala Arg Gly Gly Pro His Lys His Val

Val Val Thr Val Val Tyr Ser Val Lys His Trp Lys Pro Thr Glu Arg
65 70 75 80

Ser Ser Val Ser Ile Lys Lys Glu Glu Glu Thr Asp Trp Asp Met Asp 85 90 95

```
Gln Leu Ser Lys Gln Arg Thr Thr Tyr Glu Met Lys Ser Gly Ser Ser
100 105 110
```

Gly Val Gln Thr Glu Glu Leu Arg His Pro Ser Leu 115 120

<210> 182 <211> 77 <212> PRT <213> Homo sapiens <220>

<222> (16)
<223> Xaa equals any of the naturally occurring L-amino acids

<220>
<221> SITE
<222> (23)

<221> SITE

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (25)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (26)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (27)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 182

Asn Ala Ser Trp Glu Ile His Met Thr Gln Arg His Val Ile Pro Xaa 1 5 10 15

Leu Ala Arg Ala Ser Met Xaa Val Xaa Xaa Xaa Gln Arg Pro Ser Glu 20 25 30

Leu Cys Ser Ser Ile Arg Arg Met Ala Asn Ser Ala Gln Ile Val Phe 35 40 45

Pro Leu Pro Val Gly Ala Pro Thr Asn Thr Leu Ser Ser Leu Leu Tyr 50 55 60

Thr Val Leu Asn Thr Gly Asn Gln Gln Lys Glu Ala Val
65 70 75

<210> 183

<211> 30

<212> PRT

<213> Homo sapiens

```
<400> 183
Ala Pro Leu Arg Ala Leu Gln Gln His Ser Gln Asp Gly Lys Leu Cys
                                                          15
                  5
Thr Asn Ser Leu Pro Ala Ala Arg Gly Gly Pro His Lys His
                                                      30
                                  25
             20
<210> 184
<211> 27
<212> PRT
<213> Homo sapiens
<400> 184
Arg Ser Ser Val Ser Ile Lys Lys Glu Glu Glu Thr Asp Trp Asp Met
                                                          15
                                      10
                  5
  1
Asp Gln Leu Ser Lys Gln Arg Thr Thr Tyr Glu
                                  25
             20
<210> 185
<211> 29
<212> PRT
<213> Homo sapiens
<400> 185
Leu Cys Ser Ser Ile Arg Arg Met Ala Asn Ser Ala Gln Ile Val Phe
                                                          15
                                      10
                  5
Pro Leu Pro Val Gly Ala Pro Thr Asn Thr Leu Ser Ser
                                  25
             20
<210> 186
<211> 17
<212> PRT
<213> Homo sapiens
<400> 186
Leu Ser Ile Ile Phe Leu Ala Phe Val Ser Ile Asp Arg Cys Leu Gln
                                      10
  1
Leu
<210> 187
<211> 67
<212> PRT
<213> Homo sapiens
<400> 187
Gly Ser Cys Phe Ala Thr Trp Ala Phe Ile Gln Lys Asn Thr Asn His
                                                           15
                                     10
                   5
Arg Cys Val Ser Ile Tyr Leu Ile Asn Leu Leu Thr Ala Asp Phe Leu
```

20 25 30

Leu Thr Leu Ala Leu Pro Val Lys Ile Val Val Asp Leu Gly Val Ala 35 40 45

Pro Trp Lys Leu Lys Ile Phe His Cys Gln Val Thr Ala Cys Leu Ile 50 55 60

Tyr Ile Asn 65

<210> 188

<211> 31

<212> PRT

<213> Homo sapiens

<400> 188

Lys Asn Thr Asn His Arg Cys Val Ser Ile Tyr Leu Ile Asn Leu Leu
1 5 10 15

Thr Ala Asp Phe Leu Leu Thr Leu Ala Leu Pro Val Lys Ile Val 20 25 30

<210> 189

<211> 17

<212> PRT

<213> Homo sapiens

<400> 189

Lys His Thr Val Glu Thr Arg Ser Val Ala Phe Arg Lys Gln Leu Asn
1 5 10 15

Arg

<210> 190

<211> 30

<212> PRT

<213> Homo sapiens.

<220>

<221> SITE

<222> (18)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (29)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 190

Pro Gln Val Leu His Leu Arg Trp Leu Pro Lys Val Leu Gly Tyr Arg
1 5 10 15

Ser Xaa Pro Leu Arg Leu Ala Asp Pro Ser Thr Phe Xaa Met

20 25 30

<210> 191

<211> 131

<212> PRT

<213> Homo sapiens

<400> 191

Gln Leu Gly Phe Glu Gly Asn Asp Ser Ala Gly Glu Arg Arg Trp
1 5 10 15

Arg Gly Ala Asn Met Gln Ile Pro Leu Leu Gln Val Ala Leu Pro Leu 20 25 30

Ser Thr Glu Glu Gly Thr Gly Pro Ser Gly Pro Thr Gln Pro Ser Pro 45

Gln Gly Glu Val Arg Phe Leu Arg Ser Pro Arg Met Gly Gly Gln Val
50 55 60

Pro His Trp Glu Trp Arg Ser His Ser Leu Pro Trp Val Leu Thr Ser 65 70 75 80

Thr Leu Ser Gly Cys Glu Gly Asp Leu Pro Gly Phe Pro His Gln Val 85 90 95

Gln Leu Pro Ala Ala Glu Ser His Thr Leu Asn Thr Gly Leu Leu Arg 100 105 110

Ser Asp Thr Gly Gln Phe Thr Pro Cys Leu Lys Leu Ala Phe Glu Arg 115 120 125

Pro Ser Gly 130

<210> 192

<211> 24

<212> PRT

<213> Homo sapiens

<400> 192

Asn Asp Ser Ala Gly Glu Arg Arg Trp Arg Gly Ala Asn Met Gln Ile

1 10 15

Pro Leu Leu Gln Val Ala Leu Pro 20

<210> 193

<211> 29

<212> PRT

<213> Homo sapiens

<400> 193

Pro Ser Pro Gln Gly Glu Val Arg Phe Leu Arg Ser Pro Arg Met Gly
1 5 10 15

Gly Gln Val Pro His Trp Glu Trp Arg Ser His Ser Leu
20 25

<210> 194

<211> 27

<212> PRT

<213> Homo sapiens

<400> 194

His Gln Val Gln Leu Pro Ala Ala Glu Ser His Thr Leu Asn Thr Gly
1 5 10 15

Leu Leu Arg Ser Asp Thr Gly Gln Phe Thr Pro
20 25

<210> 195

<211> 60

<212> PRT

<213> Homo sapiens

<400> 195

Ala Pro Leu Glu Thr Met Gln Asn Lys Pro Arg Ala Pro Gln Lys Arg

1 5 10 15

Ala Leu Pro Phe Pro Glu Leu Glu Leu Arg Asp Tyr Ala Ser Val Leu 20 25 30

Thr Arg Tyr Ser Leu Gly Leu Arg Asn Lys Glu Pro Ser Leu Gly His 35 40 · 45

Arg Trp Gly Thr Gln Lys Leu Gly Arg Ser Pro Cys
50 55 60

<210> 196

<211> 217

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (85)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (97)

<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE

<222> (157)

<223> Xaa equals any of the naturally occurring L-amino acids

Met Gln Asn Lys Pro Arg Ala Pro Gln Lys Arg Ala Leu Pro Phe Pro 5

Glu Leu Glu Leu Arg Asp Tyr Ala Ser Val Leu Thr Arg Tyr Ser Leu 20

Gly Leu Arg Asn Lys Glu Pro Ser Leu Gly His Arg Trp Gly Thr Gln 35

Lys Leu Gly Arg Ser Pro Cys Ser Glu Gly Ser Gln Gly His Thr Thr

Asp Ala Ala Asp Val Gln Asn His Ser Lys Glu Glu Gln Arg Asp Ala 70

Gly Ala Gln Arg Xaa Cys Gly Gln Gly Arg His Thr Trp Ala Tyr Arg 85

Xaa Gly Ala Gln Asp Thr Ser Arg Leu Thr Gly Asp Pro Arg Gly Gly 100

Glu Arg Ser Pro Pro Lys Cys Gln Ser Met Lys Gln Gln Glu Gly Ala 115

Pro Ser Gly His Cys Trp Asp Gln Trp Cys His Gly Ala Ser Glu Val

Val Trp Pro Glu Ser Arg Lys Arg Ala Gln Ile Phe Xaa Ser Pro Cys 150

Arg Gln Ser Pro Arg Ser Ser Ala Leu Gly Ala Gly Gln Lys Leu Ala 165

Val Cys Ser Pro Asp Ile Leu Cys Cys Pro Thr Asp Thr Leu Leu Ala 180

Ser His Pro His Ser Leu Leu Thr Gly Thr Gln Phe Ser Gly Gln Thr 195

Gln Ala Leu Ala Pro Ser Trp Cys Ala 215 210

<210> 197

<211> 26 ·

<212> PRT

<213> Homo sapiens

Ala Pro Gln Lys Arg Ala Leu Pro Phe Pro Glu Leu Glu Leu Arg Asp 5 1

Tyr Ala Ser Val Leu Thr Arg Tyr Ser Leu 20

<210> 198

<211> 27

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<212> PRT
<213> Homo sapiens
<400> 198
Ala Pro Gln Lys Arg Ala Leu Pro Phe Pro Glu Leu Glu Leu Arg Asp
                                                           15
                                      10
                   5
  1
Tyr Ala Ser Val Leu Thr Arg Tyr Ser Leu Gly
                                  25
             20
<210> 199
<211> 29
<212> PRT
<213> Homo sapiens
<400> 199
Leu Gly Arg Ser Pro Cys Ser Glu Gly Ser Gln Gly His Thr Thr Asp
                                                           15
                                      10
  1
Ala Ala Asp Val Gln Asn His Ser Lys Glu Glu Gln Arg
                                  25
             20
<210> 200
<211> 25
<212> PRT
<213> Homo sapiens
<400> 200
Thr Asp Thr Leu Leu Ala Ser His Pro His Ser Leu Leu Thr Gly Thr
                                                           15
                                      10
  1
Gln Phe Ser Gly Gln Thr Gln Ala Leu
                                  25
             20
<210> 201
<211> 77
<212> PRT
<213> Homo sapiens
<220>
<221> SITE
<222> (13)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (18)
<223> Xaa equals any of the naturally occurring L-amino acids
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<223> Xaa equals any of the naturally occurring L-amino acids

<220>

<221> SITE <222> (39)

Ile Ala Gln Val Leu Lys Ala Glu Met Cys Leu Val Xaa Arg Pro His 15 10 1 Pro Xaa Leu Leu Asp Ser His Arg Gly Trp Ala Gly Glu Thr Leu Arg 30 25 20 Gly Gln Gly Arg Gln Glu Xaa Glu Ser Asp Thr Lys Ala Gly Thr Leu 40 35 Gln Leu Gln Arg Gln Ala Pro Leu Pro Leu Thr Gln His Ser Leu Val 60 55 50 Leu Pro Ile Ser Pro Gly Pro Ser Asn His Thr Gln Ser 75 70 65 <210> 202 <211> 20 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (16) <223> Xaa equals any of the naturally occurring L-amino acids <400> 202 Arg Gly Trp Ala Gly Glu Thr Leu Arg Gly Gln Gly Arg Gln Glu Xaa 1 Glu Ser Asp Thr 20 <210> 203 <211> 20 <212> PRT <213> Homo sapiens <400> 203 Ala Pro Leu Pro Leu Thr Gln His Ser Leu Val Leu Pro Ile Ser Pro 1 Gly Pro Ser Asn 20 <210> 204 <211> 166 <212> PRT <213> Homo sapiens <400> 204 Asn Arg Glu Arg Gly Gly Ala Gly Ala Thr Phe Glu Cys Asn Ile Cys 10 5 1 Leu Glu Thr Ala Arg Glu Ala Val Val Ser Val Cys Gly His Leu Tyr 30 25 20

Cys Trp Pro Cys Leu His Gln Trp Leu Glu Thr Arg Pro Glu Arg Gln

Glu Cys Pro Val Cys Lys Ala Gly Ile Ser Arg Glu Lys Val Val Pro

Leu Tyr Gly Arg Gly Ser Gln Lys Pro Gln Asp Pro Arg Leu Lys Thr

Pro Pro Arg Pro Gln Gly Gln Arg Pro Ala Pro Glu Ser Arg Gly Gly 85

Phe Gln Pro Phe Gly Asp Thr Gly Gly Phe His Phe Ser Phe Gly Val

Gly Ala Phe Pro Phe Gly Phe Phe Thr Thr Val Phe Asn Ala His Glu

Pro Phe Arg Gly Thr Gly Val Asp Leu Gly Gln Gly His Pro Ala

Ser Ser Trp Gln Asp Ser Leu Phe Leu Phe Leu Ala Ile Phe Phe 150 145

Phe Trp Leu Leu Ser Ile 165

<210> 205

<211> 149

<212> PRT

<213> Homo sapiens

Asn Arg Glu Arg Gly Gly Ala Gly Ala Thr Phe Glu Cys Asn Ile Cys

Leu Glu Thr Ala Arg Glu Ala Val Val Ser Val Cys Gly His Leu Tyr

Cys Trp Pro Cys Leu His Gln Trp Leu Glu Thr Arg Pro Glu Arg Gln

Glu Cys Pro Val Cys Lys Ala Gly Ile Ser Arg Glu Lys Val Val Pro

Leu Tyr Gly Arg Gly Ser Gln Lys Pro Gln Asp Pro Arg Leu Lys Thr

Pro Pro Arg Pro Gln Gly Gln Arg Pro Ala Pro Glu Ser Arg Gly Gly 85

Phe Gln Pro Phe Gly Asp Thr Gly Gly Phe His Phe Ser Phe Gly Val

Gly Ala Phe Pro Phe Gly Phe Phe Thr Thr Val Phe Asn Ala His Glu 115

```
Pro Phe Arg Gly Thr Gly Val Asp Leu Gly Gln Gly His Pro Ala
    130
Ser Ser Trp Gln Asp
145
<210> 206
 <211> 41
 <212> PRT
 <213> Homo sapiens
 Asn Arg Glu Arg Gly Gly Ala Gly Ala Thr Phe Glu Cys Asn Ile Cys
  Leu Glu Thr Ala. Arg Glu Ala Val Val Ser Val Cys Gly His Leu Tyr
               20
  Cys Trp Pro Cys Leu His Gln Trp Leu
            35
   <210> 207
   <211> 38
   <212> PRT
   <213> Homo sapiens
   Glu Thr Arg Pro Glu Arg Gln Glu Cys Pro Val Cys Lys Ala Gly Ile
    Ser Arg Glu Lys Val Val Pro Leu Tyr Gly Arg Gly Ser Gln Lys Pro
                      5
                 20
    Gln Asp Pro Arg Leu Lys
              35
     <210> 208
     <211> 34
     <212> PRT
      <213> Homo sapiens
      Thr Pro Pro Arg Pro Gln Gly Gln Arg Pro Ala Pro Glu Ser Arg Gly
      Gly Phe Gln Pro Phe Gly Asp Thr Gly Gly Phe His Phe Ser Phe Gly
                    20
       Val Gly
```

<210> 209 <211> 36 <212> PRT

<213> Homo sapiens

<400> 209

Ala Phe Pro Phe Gly Phe Phe Thr Thr Val Phe Asn Ala His Glu Pro 1 5 10 15

Phe Arg Arg Gly Thr Gly Val Asp Leu Gly Gln Gly His Pro Ala Ser 20 25 30

Ser Trp Gln Asp 35

<210> 210

<211> 15

<212> PRT

<213> Homo sapiens

<400> 210

Gly Leu Ser Thr Gly Pro Asp Met Ala Ser Leu Asp Leu Phe Val 1 5 10 15

<210> 211

<211> 97

<212> PRT

<213> Homo sapiens

<400> 211

Gly Arg Pro Thr Arg Pro Ser Gln Ala Thr Arg His Phe Leu Leu Gly
1 5 10 15

Thr Leu Phe Thr Asn Cys Leu Cys Gly Thr Phe Cys Phe Pro Cys Leu 20 25 30

Gly Cys Gln Val Ala Ala Asp Met Asn Glu Cys Cys Leu Cys Gly Thr 35 40 45

Ser Val Ala Met Arg Thr Leu Tyr Arg Thr Arg Tyr Gly Ile Pro Gly 50 60

Ser Ile Cys Asp Asp Tyr Met Ala Thr Leu Cys Cys Pro His Cys Thr 65 70 75 80

Leu Cys Gln Ile Lys Arg Asp Ile Asn Arg Arg Arg Ala Met Arg Thr 85 90 95

Phe

<210> 212

<211> 146

<212> PRT

<213> Homo sapiens



Ile Lys Asn Leu Ile Phe Phe Met Pro Ser Val Val Leu Lys His Ile

His His Ile Ser Val Ala Lys Asp Gly Glu Glu Leu Lys Leu Lys Arg 20

Cys Leu Leu Asn Phe Val Ala Ser Val Arg Ala Phe His His Gln Phe 35

Leu Glu Ser Thr His Gly Ser Pro Ser Val Asp Ile Ser Leu Asp Leu 50

Ala Lys Ser Thr Met Arg Thr Ala Lys Ser Cys His Ile Val Ile Thr 70

Asn Arg Ser Arg Asp Ala Ile Ser Gly Pro Val Glu Ser Pro His Cys 85

Asp Ala Cys Ser Thr Gln Thr Ala Phe Ile His Ile Ser Cys Asn Leu 100

Thr Pro Lys Ala Arg Glu Thr Lys Cys Ala Thr Glu Thr Ile Ser Lys 115

Gln Gly Ser Glu Gln Glu Met Ser Cys Gly Leu Gly Arg Thr Arg Gly 130

Ser Thr

145

<210> 213

<211> 23

<212> PRT <213> Homo sapiens

Phe Leu Gly Thr Leu Phe Thr Asn Cys Leu Cys Gly Thr Phe Cys

Phe Pro Cys Leu Gly Cys Gln 20

<210> 214

<211> 24

<212> PRT

<213> Homo sapiens

Ser Ile Cys Asp Asp Tyr Met Ala Thr Leu Cys Cys Pro His Cys Thr 1

Leu Cys Gln Ile Lys Arg Asp Ile 20

<210> 215

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<211> 30
<212> PRT
<213> Homo sapiens
<400> 215
Ser Val Val Leu Lys His Ile His His Ile Ser Val Ala Lys Asp Gly
                                                          15
                                      10
  1
Glu Glu Leu Lys Leu Lys Arg Cys Leu Leu Asn Phe Val Ala
                                                      30
                                  25
             20
<210> 216
<211> 26
<212> PRT
<213> Homo sapiens
<400> 216
Asn Phe Val Ala Ser Val Arg Ala Phe His His Gln Phe Leu Glu Ser
                                                          15
                                      10
  1
Thr His Gly Ser Pro Ser Val Asp Ile Ser
                                  25
             20
<210> 217
<211> 28
<212> PRT
<213> Homo sapiens
<400> 217
Thr Ala Phe Ile His Ile Ser Cys Asn Leu Thr Pro Lys Ala Arg Glu
                                      10
 1
Thr Lys Cys Ala Thr Glu Thr Ile Ser Lys Gln Gly
                                  25
<210> 218
<211> 6
<212> PRT
<213> Homo sapiens
<400> 218
Met Lys Gly Glu Ile Glu
<210> 219
<211> 14
<212> PRT
<213> Homo sapiens
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Glu Phe Gly Thr Ser Arg Gly Arg Gln His Arg Ala Leu Glu

10

<210> 220

<211> 80

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (72)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 220

His Gln Thr Pro Gly Val Thr Gly Leu Ser Ala Val Glu Met Asp Gln
1 5 10 15

Ile Thr Pro Ala Leu Trp Glu Ala Leu Ala Ile Asp Thr Leu Arg Lys
20 25 30

Leu Arg Ile Gly Thr Arg Arg Pro Arg Ile Arg Trp Gly Gln Glu Ala 35 40 45

His Val Pro Ala Gly Ala Ala Gln Glu Gly Pro Leu His Leu Leu 50 55 60

Gln Arg Pro Ala Pro Trp Gly Xaa Ala Pro His Gly Lys Ala Cys Gly 65 70 75 80

<210> 221

<211> 87

<212> PRT

<213> Homo sapiens

<220>

<221> SITE

<222> (39)

<223> Xaa equals any of the naturally occurring L-amino acids

<400> 221

Gly Leu Gly Gln Gly Gln Gly Leu Asp Gly Gly Arg Lys Leu Met
1 5 10 15

Tyr Leu Gln Glu Leu Pro Arg Arg Asp His Tyr Ile Phe Tyr Cys Lys
20 25 30

Asp Gln His His Gly Gly Xaa Leu His Met Gly Lys Leu Val Gly Arg
35 40 45

Asn Ser Asp Thr Asn Arg Glu Ala Leu Glu Glu Phe Lys Lys Leu Val 50 55 60

Gln Arg Lys Gly Leu Ser Glu Glu Asp Ile Phe Thr Pro Leu Gln Thr 65 70 75 80

Gly Ser Cys Val Pro Glu His

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<210> 222
 <211> 176
 <212> PRT
 <213> Homo sapiens
<220>
<221> SITE
<222> (62)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (84)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (143)
<223> Xaa equals any of the naturally occurring L-amino acids
<220>
<221> SITE
<222> (152)
<223> Xaa equals any of the naturally occurring L-amino acids
<400> 222
Ser Gly Pro Ser Arg Leu Arg Thr Ser Leu Ser His Pro Val Ser Asp
                                                          15
  1
                   5
                                      10
Val Arg Ala Thr Ser Pro Pro Gly Arg Arg Gly Gln Pro Leu Leu Gly
                                                      30
                                  25
             20
Gly Gly Gln Ser Trp Gly Pro Gly Lys Arg Ala Ala Trp Ala Leu Ser
                                                  45 ·
         35
                              40
Thr Cys Gly Gly Trp Cys Thr Gly Val Gly Gly Gly Xaa Trp Gly
     50
                          55
Trp Glu Trp Gly Arg Gly Ser Gln Ala Leu Tyr Leu Pro Gly Ser Ser
                                                              80
                     70
 65
Val Phe Arg Xaa Arg Ile Phe Phe Trp Met His Arg Ser Ser Leu Met
                                                          95
                                      90
                 85
Lys Val Asn Val Ala Ser Asn Phe Pro Pro Pro Arg Ala Val Thr Phe
                                 105
                                                     110
            100
Thr Gly Asp Thr Phe Trp Ala Ser Cys Leu Arg Lys Val Leu Ser Thr
                                                 125
                            120
        115
Thr Met Ala Phe Thr Tyr Gln Val Pro Val Ile Ser Ser Ser Xaa Arg
                                             140
                        135
    130
Val Lys Asp Arg Ala Ala Ala Xaa Pro Ser Val Thr Pro Arg Asn Arg
                                                             160
                                         155
145
                    150
```



Val Phe Ile Ser Arg Ala Leu Cys Cys Arg Pro Arg Leu Val Pro Asn 165 170 175

<210> 223 <211> 103 <212> PRT <213> Homo sapiens <220> <221> SITE <222> (74) <223> Xaa equals any of the naturally occurring L-amino acids <220> <221> SITE <222> (92) <223> Xaa equals any of the naturally occurring L-amino acids <400> 223 Gly Leu Pro Glu Gly Arg Arg Asp Leu Val His Leu Asp Cys Gly Gln 5 10 15 1 Ala Cys His Thr Arg Cys Leu Met Ser Gly Pro Pro Ala Pro Gln Glu 30 20 25 Gly Glu Ala Ser Pro Ser Leu Glu Val Gly Arg Ala Gly Ala Leu Ala 45 35 40 Lys Gly Gln Pro Gly His Ser Leu Pro Val Glu Ala Gly Ala Leu Gly 50 60 55 Leu Ala Val Gly Glu Gly Gly Gly Kaa Gly Gly Gly Ala His Arg 75 65 70 Arg Cys Ile Cys Gln Ala Pro Pro Ser Ser Ala Xaa Gly Phe Ser Ser 95 90 85 Gly Cys Thr Asp Pro Pro Ser 100

<210> 224

<211> 30

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<213> Homo sapiens

<400> 224

Val Glu Met Asp Gln Ile Thr Pro Ala Leu Trp Glu Ala Leu Ala Ile 1 5 10 15

Asp Thr Leu Arg Lys Leu Arg Ile Gly Thr Arg Arg Pro Arg 20 25 30

and that the the test of the the test that the that the

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<210> 225
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<211> 23

<212> PRT

<213> Homo sapiens

<400> 225

Arg Lys Leu Met Tyr Leu Gln Glu Leu Pro Arg Arg Asp His Tyr Ile 1 5 10

Phe Tyr Cys Lys Asp Gln His 20

<210> 226

<211> 23

<212> PRT

<213> Homo sapiens

<400> 226

Glu Ala Leu Glu Glu Phe Lys Lys Leu Val Gln Arg Lys Gly Leu Ser 1 5 10 15

Glu Glu Asp Ile Phe Thr Pro

<210> 227

<211> 27

<212> PRT

<213> Homo sapiens

<400> 227

Arg Ala Thr Ser Pro Pro Gly Arg Arg Gly Gln Pro Leu Leu Gly Gly
1 10 15

Gly Gln Ser Trp Gly Pro Gly Lys Arg Ala Ala 20 25

<210> 228

<211> 29

<212> PRT

<213> Homo sapiens

<400> 228

Phe Phe Trp Met His Arg Ser Ser Leu Met Lys Val Asn Val Ala Ser 1 10 15

Asn Phe Pro Pro Pro Arg Ala Val Thr Phe Thr Gly Asp 20 25

<210> 229

<211> 28

<212> PRT

<213> Homo sapiens

with the time that the wind the time the time that the time that

102

Cys Leu Met Ser Gly Pro Pro Ala Pro Gln Glu Gly Glu Ala Ser Pro
1 10 15

Ser Leu Glu Val Gly Arg Ala Gly Ala Leu Ala Lys 20 25